

SOCIAL AND RURAL ECONOMY
OF
NORTHERN INDIA

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VOL. I

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PREFACE

The piecemeal publication of the work which from the outline would appear to be a concrete whole owes an apology. It was completed a few years from now. But the printing is delayed due to unavoidable circumstances. Of late these difficulties have considerably increased. The first volume is therefore hurried through in great stress. I wont put forth my own preoccupations as a plea. The indulgence of readers is craved for slight printing and other mistakes which if pointed out, will be thankfully received.

My thanks are due to those journals who have given kindly berth to much of the contents of this volume, to the C. U. Press which printed the bulk of this book and is printing the second volume, to the Eka Press which printed the introductory parts, to my numerous friends and professors from whom I got encouragement and helpful suggestions, particularly to Profs. H. C. Raychaudhuri, M.A., Ph.D. and B. M. Barua, M.A., D.Litt. to whom I am deeply indebted for this humble research enterprise.

Calcutta
March, 1942.

ATINDRA NATH BOSE

ABBREVIATIONS

An.	Anguttaranikāya	Ptol.	Ptolemy's Geography
Āpast.	Āpastamba	Pug.	Puggalappannatti
Arr.	Arrian's Indica	Pv.	Petavatthu
Arr. Anab.	Arrian's Anabasis	PvA.	Petavatthu Atthakathā
Arth.	Arthaśāstra of Kauṭilya	Rām.	Rāmāyaṇa
Av.	Atharvaveda	Rv.	Rgveda
Baudh.	Baudhāyana	Sn.	Samyuttanikāya
Ch. Dhp.	Chinese Dhamma- pada (Beal)	Śp.	Sāntiparva, Mahābhārata
Cp.	Cariyapiṭaka	Str.	Strabo's Geography
Cv.	Cullavagga	Śuk.	Śukranīti
Dhp.	Dhammapada	Sut.	Suttanipāta
DhpA.	Dhammapada Atthakathā	Therag.	Theragāthā
Diod.	Diodorus	Therig.	Therigāthā
Dn.	Dīghanikāya	Ud.	Udāna
E. I.	Epigraphia Indica	Vāś.	Vāśiṣṭha
Gaut.	Gautama	Vbh.	Vibhangā
Jāt.	Jātaka	VbhA.	Vibhangā Atthakathā
J. S.	Jaina Sutras (Jacobi)	Vin.	Vinaya
Kāt.	Kātyāyana (collection)	Vis.	Visnu
Mbh.	Mahābhārata	Vr.	Vṛhaspati
Mil.	Milindapañho	Vv.	Vimānavatthu
Mn.	Majjhimanikāya	VvA.	Vimānavatthu Atthakathā
Mv.	Mahāvagga	Yāj.	Yājñavalkya
Nār.	Nārada		
Peri.	Periplus of the Erythrean Sea		

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11. " " XXV, " Manu.
12. " " XXXIII " Narada & Vrihaspati.
13. " " XXII, XLV, Jaina Sutras.
14. " " XIII, XVII, XX, Vinaya Texts.
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INTRODUCTION

Though sufficient work has been done in the field of Indology to dispel the antiquated notion that ancient Indians wandered only in spiritual quests and knew no economic enterprise worth the name, the rebuilding of a consistent and comprehensive economic history of India still awaits completion. A cursory chapter by Rhys Davids in his Buddhist India, Mrs. Rhys Davids' erudite collections on "Early Economic Conditions in Northern India" in J. R. A. S. 1901, Richard Fick's celebrated "Die sociale Gliederung im Nordöstlichen Indien zu Buddhas Zeit" written from a social rather than purely economic standpoint, were till lately the sole conspicuous works in the field ; and even these were written exclusively on Buddhist sources. The authors moreover antedated their materials, as has been revealed by modern research. The plausible effort of N.C. Banerji stops with the first volume of the "Economic Life and Progress in Ancient India" ending before the period of the Maurya Empire. This volume, which is a masterly collection of valuable data, together with J. N. Samaddar's small series of Ashutosh Lectures on Economic Condition of Ancient India just offer the starting point for a more systematic and comprehensive attempt. The chief drawback of the latter is that it makes no endeavour to collate the evidences gathered from different source materials and is at best a good analysis of them. There are excellent monographs like Ghoshal's Hindu Revenue System (his Agrarian System in Ancient India is only a summary of his Revenue System with a short lecture added on the legal ownership of land) and Mukerji's Indian shipping. But such treatises again are limited in their scope and the former does not fully exploit the Pali literature ; nor has any appreciable work as yet been done to bring the prodigious labours of Maine and Baden Powell into line with modern discoveries on the agrarian system.

The purpose of this thesis is to attempt, not too succinctly or piecemeal, an economic survey of Northern India between the days of Buddha and Kaniska's successors, i e., *cir.* 600 B.C.

—200 A.D. Between the supremacy of Magadha under Bimbisāra and decline of the Kusāna Empire after Vāsudeva I, the political history of Northern India has been reconstructed into a workable frame-work intervening two big gaps still unconquered by labours of research. The economic development of this age, summarily but not too plausibly called the Buddhist age is full of interest and organised effort and may be taken up with some confidence. The Jātakas and the Pali canon after the period of their development has been ascertained though between widely stretched limits, require to be studied with reference to the copious contemporary literature that has come down in the shape of the epics, legal codes, commentaries, inscriptions, notes of foreigners, etc. This is a desideratum in the field of economic history of ancient India.

Buddhist Literature

The Buddhist works, the canon with the voluminous commentaries of Buddhaghosa and Dhammapāla and the mass of the Jātaka stories are not only the widest source, they give the truest picture from life. The law-books, even the didactic portions of the Epics, take up law and morals for the guidance of public and private life only from the standpoint of theorising Brāhmanism, irrespective of facts, to establish the 'divine' rule. This is illustrated in the priestly theory of caste which never existed in contemporary society in the form of four *varnas*¹ and strictly demarcated mixed and sub-castes on functional basis with precise rules on marriage, interdining, ceremonial pollution and social sanction as represented in the Brāhmanical and theoretical portions of Buddhist books². If the Brāhmanical theory in its turn reacted powerfully on actual conditions (helped by localisation of crafts and professions), the results are to be sought in an age much later than ours. Where the Buddhist

¹ Such opinion was held by Kern, Oldenburg and others.

² See Senart—Les Castes Dans L' inde, pp. 139-40; "La doctrine officiale n'admet que quatre castes ; la réalité fait éclater ce cadre trop étroit : elle en montre un nombre infini—Mais la théorie par plus d'un indice, par les contradictions même on elle s'engage, constate et avoue que de vieille date, les castes été bien autrement nombreuses qu'elle ne paraît d'abord le suposer. J'ai dit combien il est douteux qu'une caste de Kṣatriyas et de Vaicyas ait jamais réellement existé. On sent de reste combien des catégories si vastes sont peu compatibles avec les règles même avec cet exclusivisme jaloux, cette organisation corporative et autonome qui caractérisent la caste vivante. P. 138. See also Fick—Die Sociale Gliederung, pp. 3-6.

writers do not go for theorising they observe an objective attitude on material life and the casual nature of their references, unconnected with the morals, or the parables drawn up to emphasise a sermon, testify to the genuineness of the data on popular life which we find therein. The Jātakas are peoples' literature and (garbled as they are with legends and partially vitiated with the Bodhisatta factor) for the reconstruction of the peoples' history their worth is far weightier than that of the Smṛtis with their pedantic polemics or of the Epics with their sophisticated poetry.

The view upheld by Bühler, Rhys Davids and Fick and followed even by recent scholars¹ that the Buddhist texts and the Jātakas represent society only prior to the fourth century B.C. has undergone considerable revision. Reference in the Jātakas to Jambudipa, Suvaṇṇabhumi, Andhapura and Tambapanni, display a far larger geographical horizon and nomenclature than any pre-Maurya literature. The Jātakas know the various forms of slavery enumerated in the Arthaśāstra and the legal literature which the Vinaya Piṭaka, believed to be among the older portions of the Pali canon, does not². The Jātakas reflect the syncretising process between Brāhmaṇic and Buddhist cults except in the matter of animal sacrifice. Buddha's homily of equality of castes in the Assalāyana Sutta is in pronounced contrast with later texts where the isolation of the despised Cāndālas and Pukkusas even smack of Manu.

The Tipiṭaka or Pali canon is said to be a compilation of Buddha's sayings as preserved by oral tradition and according to tradition was brought to Ceylon by Mahinda and first committed to writing under the Ceylonese king Vattagāmani in the first century B. C. Between the third and the first centuries B. C. the canon underwent great transformations. This accounts for numerous contradictions, repetitions and juxtapositions of early and late traditions within the canon.

¹ See R. C. Majumdar : Corporate life in Ancient India, Introduction. Ghoshal : Agrarian System in Ancient India, P. 89.

² The Jātakas are familiar with slaves (1) reduced by punishment (I. 110), (2) purchased (III. 343), (3) 'born in the house' (I. 452), (4) captured in raids (IV. 220), (5) by gift (VI. 546f), (6) voluntary enslavement (VI. 87), (7) by fear (VI. 285). For later classification of slaves, cf. Arthaśāstra, III. 13, and Manu, XVIII. 415. The Vinaya distinguishes slaves only as follows : (1) born slaves, (2) purchased with money, (3) captured in raids : antojāto dhanakkito karamarānito (Bikkhunivibhangha, Samghādisesa, 1. 2. 1.). Ignorance of the 'daṇḍadāsa' is particularly significant.

Below is given an analysis of the Tipiṭaka with reference to the birth period of its component parts as established by the latest research¹.

A. Vinayapiṭaka : rules of the Order or monastic discipline.

I. Suttavibhanga—(1) Mahāvibhanga (2) Bikkhuni-vibhanga.

II. Khaṇḍakās—(1) Mahāvagga (2) Cullavagga.

III. Parivāra or Parivārapāṭha—a much later production.

B. Suttapiṭaka : Dhamma or the Religion.

I. Dīghanikāya—3 Books represent successively later strata of tradition.

II. Majjhimanikāya—contains similar interpolations, e.g., *suttas* Dn. 14. Mn. 123 attribute to Buddha and Moggallana all the miracles which Buddha himself instructed monks not to practice and which are seen in later non-canonical works like Nidānakathā, Lalitavistara, etc. Mn. 93 mentions Yona-Kambojas of Graeco-Bactrian empire i.e., of the third century B. C.

III. Samyuttanikāya—Some *suttas* exhibit an epic and dramatic tinge hardly creditable to early Buddhist monks (e.g., V. 3). The prose enwrapping the sayings on Karman (III. 2, 10, 31) reads much like a commentatorial addition.

IV. Anguttaranikāya—Compiled at a time when the deification of Buddha was complete; compare the manner in which preaching monks answer to Indra (IV. 163f) with Aśoka's Bhabru Edict—"all that Buddha said is well said" and later Sanskrit work like Divyāvadāna—"the Buddhas will never utter what is false".

V. Khuddakanikāya—the collection was probably concluded at a late period and not a few texts included even afterwards. Its works originated at different times.

(1) Khuddakapāṭha or short recital (2) Dhammapada or religious sentences (3) Udāna or pithy sayings—narrative portion is often silly compared to the verse and seems added by compiler. In the Pāṭalisautta it is prophesied that Pāṭaliputta will be a great metropolis and will be partly destroyed

¹ Winternitz : History of Indian Literature, Vol. II, B.C. Law : History of Pali Literature, Ch. I.

by fire, flood and war. History testifies to the accuracy of the prophecy which seems to have been made after the incidents (4) *Itivuttaka* or ‘thus spake Buddha’ sayings—contain earlier and later matters in both prose and verse (5) *Suttanipāta* or section of discourses—the three ballads dealing with scenes from Buddha’s youth prepare the chief features of the later Buddhist legend like the epic counterpart of the Ākhyānas, by the insertion of narrative stanzas between conversational stanzas. Sometimes a Yakkha or a God comes irrelevantly to introduce a dialogue (I. 6, 10 ; II. 4, 5, ; III. 10) no doubt made by the *Sangitikārakas* (6) *Vimānavatthu* or stories of divine places and (7) *Peta-vatthu* or stories of the dead—belong to the latest stratum of literature incorporated in the canon. They explain the sublime doctrine of *Karman* of Brāhmaṇical and Buddhist texts with crude examples. Even later commentators sometimes admitted their spuriouness e.g., King *Pingalaka* (*Petav.* IV. 3) ruled according to *Dhammapāla*’s commentary 200 years after Buddha (8) *Theragāthā* or songs of Elders and (9) *Therigāthā* or songs of lady Elders—the old and new are mixed up, e. g., a monk who wandered in heavens for 8,000 million years by offering a single flower, forestalls the Buddhist cult of *Mahāyāna* texts (*Therag.* 96); a seven year old saint performs miracles (429ff) ; a monk multiplies himself a thousand times and flies through the air (563ff) ; 10,000 Gods of *Brahmā*’s heaven receive *Sāriputta* and do him honour (1082ff) ; the two poems describing the decay of religion (920-48, 949-80) are held to be post-Āśokan. So also *Therig.* 400-47, 448-51 particularly the last two songs (10) *Jātakas* or Bodhisatta stories—in their present form, represent no single culture period. To gain converts, Buddhist monks circulated popular folk-tales in which Bodhisatta was made to play a part and thus converted any folk-tale into a *Jātaka* story. Besides they improvised new ones. Thus were accumulated fables and sermons of many generations. The original canonical *Jātaka* does not contain all the *Jātakas* available in the commentary edited by Fausböll.¹ That much of both prose and poetry belonged to Budhist tradition in the second century B. C. is proved by the Barhut, Bodhgaya and Sanchi reliefs depicting scenes which occur only in prose. “For the great mass of the verses however, no greater antiquity than the third century

¹ See Rhys Davids : Buddhist India. Ch. XI. B.M. Barua : Barhut, Bk. I.

B. C. can conscientiously be urged, certainly not proved, and much of the prose assuredly belongs to the Christian Era¹ (II) Niddesa or explanations,—a commentary of antiquity (12) Patisambhidamagga or path to analysis—treated after the fashion of the later Abhidhamma texts (13) Apadānas² or glorious deeds—parallel to the Sanskrit Avadānas; as copious a narrative work as the Jātakas and one of the very latest; included in the canon not earlier than the 1st century B. C. (14) Buddhavaṁsa² or legend of the 24 former Buddhas—the commentator says that the work was recited by Buddha and handed down in uninterrupted course to the third council and beyond. But the earlier texts are familiar with only six predecessors of Gautama and it is replete with that Buddha worship and Buddha deification foreign to earlier texts. Included in the canon not earlier than the 1st century B. C. (15) Cariyapiṭaka—35 Jātakas in verse illustrating the Pāramitās of Bodhisatta. They presume a knowledge of the Jātaka stories and dry them up for purpose of canonisation; one of the latest products.

C. Abhidhammapiṭaka : Dhamma treated in more scholastic and catechistical fashion : (1) Dhammasaṅgani (2) Vibhanga (3) Dhātukathā (4) Puggalapannatti (5) Kathāvatthu—attributed by tradition to Tissa of the third century B. C. who wrote it to refute heresy and quotes from Vin. P., Sutta P. and other authorities all in the name of Suttanta. In its present form it is even garnished by the later orthodoxy (6) Yamaka (7) Paṭṭhana Pakarana.

The authenticity of the Abhidhammapiṭaka as Buddhvacana has been doubted.

Two non-canonical Pali works may be useful for our purpose ; the Milindapañho, a composition of the first century A. D. at the latest when the memory of the Greek King might still be fresh ; and the Mahāvastu—a treasure house of Jātaka and other narratives extending between the second century B. C. and fourth century A.D.

The later compilation of the canon and its composite character disallow us as firm a chronological footing for the

¹ Winternitz : History of Indian Literature ; tr. by Mrs. S. Ketkar. Vol. II. pp. 121-2.

² See B.M. Barua : Asutosh Silver Jubilee Volumes,—Mahāyāna in the Making, where the author argues that the books were thrown in after the compilation of the Canon.

6th century B. C. as some Andhra and Saka inscriptions provide us in the 2nd century A.D. But a careful scrutiny of the canon would reveal materials that may safely be used for the time of Buddha and others unquestionably for pre-Mauryan times. The early and late portions may be probably distinguished from their geographical notes which, far more accurate than the *Mahābhārata*, seem to be solidly founded on personal observation¹. Stray and scanty but nevertheless positive data for the pre-Mauryan period are also available in incidental notes of foreign historians and in indigenous works like Pāṇini's grammar which may be referred back to the 7th or 6th century B. C.

The veil of the mystery of Tretā and Dwāpar hanging around the great Epics has long been torn off; and it is now accepted without dispute that they unfold to the critical eye successive strata of social and economic development extending over a wide range of place and time.

Th. Mahābhārata

That the *Mahābhārata* was a unified composition conceived and worked out by a master artist of remote antiquity² is a theory no longer credited with accuracy. Its battle episodes alone reflect a long span of evolution—religious and political. There are striking contradictions throughout its composite structure. While the Kauravas are the villain of the piece and Pāṇḍavas pious and brave, it is the latter who knock down the Kaurava heroes with treachery and unfair combat; and Kṛṣṇa, the archtraitor and casuist who defends all his guiles as means to an end is elevated as incarnation of Viṣṇu. Winternitz³ explains the anomaly by supposing that the bards originally under the aegis of the Kauravas, must have remodelled their songs to suit new patrons when political supremacy passed to the Pāṇḍavas; and the deified Kṛṣṇa,—there might have been more than one man of that

¹ E. g., the description of Giribbaja and its five mountains, of the townlets and the 6 large metropoles in the time of the *Mahāparinibbāna*. Mark also that where Pāṭaliputra comes, it is introduced only by way of prophecy to materialise in future, otherwise the placename being Pāṭaligāma.

² J. Dahlmann: *Das Mahābhārata als Epos und Rechtsbuch*; also Sylvain Levi, etc.

³ History of Indian Literature, Vol. I.

name,—was invoked to defend their questionable methods.¹ The whole of the Virātaparva is again believed to be a later production :—the simultaneous defeat of all the Kaurava stalwarts within a few hours at the hand of single-handed Arjuna fits ill with the main battle won after eighteen days with bitter travail by the mobilised forces of the Pāṇḍavas and their allies.

Nor is the Mahābhārata homogenous in language, style and metre. The language is at places archaic, akin to the Vedic literature, at places it sounds like the Purānic. The style varies from the naive Ākhyāna or narrative style of the Brāhmaṇas and Upanisads to the most negligent Purāna style and the Kāvya recalling even the ornate lyric of Kālidāsa.² The metre, mainly abides by the *śloka* which originated in the *anuṣṭuv*. But this exhibits earlier and later forms ; and there are also old prose, rhythmical prose and prose interspersed with verse ; *tristuv* metre in old and later forms and elaborate metres of classical Sanskrit.

So the Mahābhārata suffered retouch and interpolations as late as in the 4th century A.D. After that, except for comparatively minor additions and alterations, the book was accepted as a sacred text³. As regards the earlier date, it harks back to the Vedas. But the Vedic texts never mention it by name. The Sūtra literature gives earliest references to the book and its characters. Sāṃkhāyana cites a war in the Kurukṣetra which ruined the Kauravas, Āśvalāyana mentions the Mahābhārata as a sacred book. Pāṇini explains the derivations of names like Yudhiṣṭhīra, Bhīma, Vidura, Mahābhārata, etc. The existence of the Vaiśampāyana Mahābhārata is presupposed by Pāṇini. In Patañjali are available definite allusions to the story of the battle between the Kauravas and the Pāṇḍavas. In the Pali canon as well as in the Brāhmaṇas we find the narrative form trying its hand for the epic. Names from the Mahābhārata occur also in the Jātakas ; that their surroundings and the story spun around them are a caricature of the Epic probably only explains that it did not as yet travel far in eastern India. Hence it definitely goes as far as 4th century

¹ A disputable assumption however. If true, the reconciliation of the crafty and divine Kṛṣṇa was done almost to perfection.

² Dronaparva—the nocturnal scene of the battle-field. Canto 185.

³ Winteritz—*op. cit.* Vol. I. p. 463. Washburn Hopkins : Cambridge History, Vol. I. Ch. XI. p. 238.

B. C. and most probably further back to the 6th century B.C. i.e., earlier than Pāṇini. Thus our Epic may have received roughly its present shape during the period extending between *cir.* 600 B.C. and *cir.* 400 A.D.¹

The Rāmāyana

The Rāmāyana was subjected to similar transformation though perhaps in a lesser degree than the Mahābhārata. The singers of the Rāma saga no doubt took some liberty with the original tradition orally handed down, to suit the vagaries of audiences. This alone may explain the difference between the available recensions of the text. Upon the first written story of Vālmiki again, accumulated a heap of interpolations difficult to trace. To this category belong perhaps Sītā's fire ordeal at the end of the Lamkākānda where Rāma with unwonted cruelty and shamelessness says to Sītā that he rescued her only to vindicate Iksvāku honour and condones her death and which brings the gods to invoke Rāma as god Visnu, the following scene of Rāma's interview and embrace with Dasaratha, the scene of the sending of search parties for Sītā in the Kiskindhyākānda,² the romantic scenes in the Sundarakānda, the Brāhmaṇical legends at the beginning of the Āranyakānda and others. By an examination of a portion of the Rāmāyana Jacobi found only a quarter as genuine.³

The Ādikānda and the Uttarakānda, the first and the last Books are held to be spurious in *toto*. Events like the marriage of Rāma's brothers referred to in Book I are completely ignored in later ones. The language and style are also inferior. In these two Books Rāma is an incarnation of god Visnu while elsewhere, with rare exceptions (which are supposed to be interpolated) he is a mortal hero. The main theme of the narrative is frequently broken by the insertion of Brāhmaṇical legends in the manner of the Mahābhārata and the

¹ The earlier date of the composition of the Mahābhārata is generally placed about 400 B. C. But the reference in Āśvalāyana to Jaiminīya Bhārata and more particularly, in Pāṇini to the Vaiśampāyana Mbh. leaves little room for doubt that there was a pre-Pāṇinian version of the Mahābhārata as distinguished from the later (Maurya ?) recension.

² The four directions are mentioned in such a way as to seem that the sender of emissaries, Sugriva, is seated at somewhere about the Kuru country while he was really at Kiskindhyā (Deccan). This suggests that somebody from the region of Kurukṣetra introduced the scene (40-43).

³ Quoted in Winteritz—*op. cit.* Vol. II. p. 500 fn.

Purāṇas, a case rare among other Books. Thus in Book I of the legends of Rṣyaśṛṅga, Vaśiṣṭha and Viśvāmitra, of Vāmanāvatāra, of Gaṅgā's descent from heaven, of the churning of the ocean by the gods and demons, are related at the flimsiest pretexts and so the genealogy and chronology of the Rāksasas, the adventures of Rāvana, Hanumat, etc., the myths of the slaying of Vṛtra by Indra in Book VII have no bearing on the narrative. Only a fourth of the Uttarakānda bears on Rāma and Sītā. In these two Books Vālmiki becomes a contemporary of his hero and consequently a legendary figure. These two phenomena alone, deification of Rāma and conversion of Vālmiki into a legendary figure presuppose centuries of development.

The Rāmāyaṇa falls within the larger period of development of the Mahābhārata which is a larger and subtler epic. The latter presents with the first and last Books of the Rāmāyaṇa the same Brāhmaṇical legends but with such variation as to suggest a common source. The two Epics also show remarkable conformity in phrases, idioms and even whole verses and in language, metre and style.

In connexion with the abduction of Draupadī the Mahābhārata relates the Rāmopākhyāṇa, i.e., the abridged Rāmāyaṇa in its fully developed form.¹ It contains many other references which prove familiarity with the Rāmāyaṇa as an ancient work. The Rāma epic is fully known to Āśvaghosa, author of Buddhacarita and contemporary of Kaniska. From the second century the Rāmāyaṇa begins to be hardened as a popular epic. Its public recitation came in vogue in the time of Kumāralāṭa's Kalpanāmaṇḍitikā (cir. 200 A. D.) and it was garbled with Buddhist motives by Chinese translators from the third century onwards. These data fix the posterior date of Rāmāyaṇa to some time earlier than 200 A.D.

The determination of the anterior date with any claim to approximation is a more complicated affair. What is the farthest antiquity that the Rāmāyaṇa can claim? The Vedic literature is as silent on the Rāmāyaṇa as on the Mahābhārata. So the Pali canon : it knows the Rāma saga but no Rāma epic and its ballad poetry is forerunner of the epic

¹ Raychaudhuri opines that the Rāmopākhyāṇa is not borrowed from the finished Rāmāyaṇa but derives from a common tradition as does the Dasaratha Jātaka—Studies in Indian Antiquities, Part. I. Ch. III.

poetry. Both its contents and style assign it an earlier date than the Rāmāyana. Pānini is equally mute. The use of the significant words “Kiskindhyāguhā” and “Vānarasainya” by the commentator Patañjali indicates that the Rāmāyana was a widely circulated written book by the second century B. C. The name of Daśaratha, Aśoka's grandson certainly borrowed from the Rāmāyana dates the popularity still earlier. Coming from external to internal evidence we find that the knowledge of southern India beyond the Godāvarī is still very vague. The older and authentic portions of the Rāmāyana show absolute ignorance of Greeks and Greek-influence. From the mention of Buddha as an atheist punishable like a thief (II. 109. 34), it seems that Brāhmanism was hostile to Buddhism and that the eclecticism of the Kusāna period was far to come. The Rāmāyana reflects the Vedic ritual; its gods are elemental (Indra, Varuṇa, Pavana, etc.) not sectarian (Viṣṇu, Śiva, etc) who stepped in from the time of the Kāṇvas and the Sātavāhanas. The reference to Rājagrha and not Pātaliputra as the capital of Magadha and of Kośala as a Mahājanapada suggests that the memory of Kośalan ascendancy did not yet fade among the public. These clues throw the original composition of the Rāmāyana as far back as the fourth century B. C.¹

Thus the course of modification and development of the Rāmāyana may be roughly placed between *cir.* 400 B. C.—*cir.* 200 A. D.

Megasthenes

Megasthenes' accounts in its surviving scraps within the Greek epitomes is meagre and distorted, but still it is a precious mine of concrete information for our period. Only he requires careful sifting and interpretation by reference to current theories and folklore. His quaint remarks, often summarily dismissed as cock and bull stories,² shed off

¹ Winternitz (*op. cit.* Vol. II. pp. 503ff.) places the origin in *cir.* 300 B. C. It has even been argued that the Rāmāyana is anterior to the Mahābhārata and that the latter represents a more barbaric stage of Indo-Aryan culture owing to foreign invasions—Nagendra nath Ghosh : Asutosh Silver Jubilee volumes, Vol. III. Part. II. pp. 362ff For the opposite view see Weber, History of Indian Literature, pp. 191-94 & Mac Ionell : History of Sanskrit Literature, p. 306.

² See Rhys Davids : Buddhist India, pp. 260ff. He follows Strabo and Pliny in a somewhat unfair disparagement of Megasthenes. A powerful vindication of Megasthenes is made in the introduction to Schwanbeck's collection which is quoted in McCrindle's edition.

their oddity and give reliable data when the reader manages to see things with the eye of people who lived 2,300 years back, who viewed every strange phenomenon with superstition and shrouded every uncommon incident with legends,—when the reader subjects them to analytic criticism and divests them of the cloak of antiquity. A few illustrations may be taken to illuminate the point.

The seven castes of Magasthenes were not all imagination. As has been said above, the fourfold division of caste was only a Brähmanical fetish at least before the Christian era. As to the classification which slowly emerged out of the separation of crafts and callings, hardening gradually under the principle of heredity, Megasthenes was not very wide of the mark. His philosophers correspond to the Samana and Brähmana, his husbandmen to the Gahapati and Kuṭumbika, his herdsmen and hunters to the Pasupāla and Nesāda, his artisans to the Kammāra and Vaddhaki, his warriors, overseers and counsellors and assessors to the Rājabhogga and Rājañña, all of which find plenty of references in the Jātaka stories. Nor was the principle of endogamy which he averred—though too dogmatically, entirely a fiction.

That the Indians employed slaves is not disproved by Magasthenes' statement. But it shows the magnitude of difference in the position of slaves in ancient India and Greece. He could not equate the *dāsas* with the slaves and helots of his own country and searched in vain in India for the vertebrate creatures of the Greek mines and the Roman *latifandia*. The *bhataka* or hireling who stood lower than the *dāsa* in economic scale was no man's chattel and could not technically be called a slave.

That famine never visited India may also have been a comparative statement or he may have meant a general or protracted scarcity. "The times of scarcity in Buddhist record apparently refer only to brief periods over restricted areas."¹

For the gold-digging ants, the Greek visitor was undoubtedly indebted to folk-tale. But it has surely a substratum of truth. Even if the theory that it was a mythical version

¹ Mrs. Rhys Davids : Cambridge History of India. Vol. I. Ch. VIII.

of Tibetan miners¹ is not given credence, there is no dispute that the Indian soil was rich in gold mines and her sands and river beds contained gold-dust, whether these were extracted planfully by man or by some prehistoric animal by chance. So the assertion that Indians are ignorant of writing must be understood with reference to the absence of written laws and to judicial transactions made upon the memory of the judges, which perhaps was a fact² as well as in the broader sense that it was more in practice to hand down tradition and wisdom by oral transmission; that Indians do not practice usury reflecting the stigma placed on it by law-givers or as conveying that rates of interest were low and money-lending did not lead to spoliation of the debtor; that land was held in tenancy from the crown by payment of a rent as indicating that the crown was the theoretical owner of all land.

Megasthenes' accounts exist through the works of Strabo, Diodorus, Quintius Curtius, Arrian, Justin, Aelian, etc., who had access to other first-hand materials now lost to us,—a crop of narratives and memoirs from men who accompanied Alexander's expedition or visited the Indian courts. The incidental notes of Herodotus, Ctesias and Plutarch are of little good. Other classical works for reference are Pliny's Natural History and Ptolemy's Geography. The Periplus of the Erythrean Sea gives a host of details that contribute to the bulk of our chapters on Industry and Commerce.

Archeological Material

Archeological matters are the most trustworthy of our sources; but their paucity is tantalising. The land charters of later times which throw a flood of light on contemporary economic organisation are conspicuous by their absence. The monuments and relics of Taxila, Rajgir, Sarnath, Pātaliputra, etc., throw sidelights on the progress of mechanical arts and craftsmanship. Asoka's Edicts are far less helpful for the reconstruction of Maurya economy than for an understanding of his ethical and administrative system. The Barhut reliefs and inscriptions attributed to the time of the Sungas, the votive inscriptions from Sanchi stupas and the Bhāttiprolu Inscriptions both assigned by Bühler to cir.

¹ See Ind. Ant. Vol. IV. pp. 255 ff.

² See J. H. Nelson : J. R. A. S., Vol. XIII. Pt. II.n.s. p. 208.

200 B. C. and the Jaina sculptures and inscriptions from Mathura assigned by the same scholar between the 1st and the 2nd centuries A.D. give more concrete materials to fill up gaps or corroborate evidences of literature. Hardly less profitable are Khāravela's Hathigumpha Inscription, the Karle and Nasik Cave Inscriptions and the Girnar Rock Inscription of the Saka Rudradāman from the 2nd century A.D. Few as they are, without these inscriptions and similar objective data our work would be a mass of boneless and hypothetical speculation founded on air, without a footing of time and place.

The Śāstra & Sūtra Literature

The Arthaśāstra attributed to Kautilya and the voluminous lawcodes, the earlier Dharmasūtras of Gautama, Baudhāyana, Āpastamba and Vāśistha and the later Dharmasāstras of Manu, Viṣṇu, Yājñavalkya, Nārada and Vṛhaspati in order of date—form a class by themselves. The Arthaśāstra, an encyclopaedic digest of social sciences and allied branches, is the most precious of our source materials after the Jātakas. But many scholars have fallen into a double error in utilising it. They take it conclusively to be a work of the early Maurya period emanated from the brain of an iron chancellor. There is weakness in these theories and in my opinion the work may be assigned *a fortiori* to near about the 1st century A.D.¹ Again it is often treated in a way as if it is an administration report while really it is polemical literature evincing how far the conception of administrative perfection may go. In sharp contrast to the other authorities the Śāstras concentrate exclusively on theorising and scholars are prone to arriving at conclusions on facts and institutions from political and juristic opinion.² As has been said above, the theory of *caturvarṇa* adumbrated with great pains finds less correspondence in facts. The laws of property and inheritance, of

¹ See my paper in Indian Culture, Vol. IV. No. 4.

² Cf. Ghoshal: Agrarian System in Ancient India, p. 5—"the resemblance between the Arthaśāstra material on law and polity and that of the Smritis is so close that we can unhesitatingly take them to be the allied branches of a common system. The roots of this system should doubtless be traced to actual forms of state and bodies of law existing in ancient times although it is impossible to specify either the period of time or the tract of country to which they belonged". Also Hindu Revenue system, p. 13.

It is confidently asserted by another scholar that the Arthaśāstra represents actual and not ideal conditions of state and administration as conceived and executed by the author. See M. H. Gopal, Mauryan Public Finance, p. 14.

marriage, on king's prerogative and subject's right have all to be treated with much scepticism. The political and legal literature serve as a commentary on other references ; and it is well to remember Senart's admirable instruction ;—ce n'est pas la théorie qui peut rendre compte des faits ; ce sont les faits qui aident à voir la théorie sous son vrai jour à la ramener dans ses justes limites.

So far for out materials. Yet these are not all. For I have not hesitated to draw carefully from much later literature particularly theoretical treatises like the Jaina scriptures, the Dharmasāstras and the Śukranīti. Works like these which embody time-worn traditions should not be studied with strict chronological demarcation. But it will be erroneous to gauge our resources from their volume. The treatises on Arthaveda which formed a branch of study among a group of four, comprising the *summum bonum* of life, and on Vārttā, the sciences on agriculture, cattle-breeding, trade and usury referred to by the Arthaśāstra attributed to Kauṭilya have all been lost except the above-mentioned one. And barring this and the Periplus, none of our books are written from an economic point of view and we ransack them in vain for detailed information and proved facts. They throw us moreover amidst a host of difficulties. The Smṛtis, the Epics, the Purāṇas and the Jātakas describe a social condition different from the time of their composition. They jumble up time-worn traditions and legends with contemporary institutions and the only way out of the puzzle is to sift and arrange them in order of a natural process of evolution, checked with informations supplied by Megasthenes, the inscriptions and literature of which the date is less conjectural. Our materials moreover, present no homogeneous society with uniform practices prevailing all over Northern India to be drawn in bold outline. The tone of the Buddhist literature is democratic. The Kṣatriyas are theoretically awarded social precedence but in popular stories the moneyed middle class (*setthi* and *gahapati*) the industrial and commercial aristocracy of Anāthapindika's type is most prominent. The Epics barring certain interpolated episodes, paint a theocratic state wherein martial and religious motives preponderate. The law-books are written with the declared purpose to enforce the divine law. The Arthaśāstra while agreeing with them

¹ op. cit. p. 129.

on many points maintains all along an economic outlook. Again the sphere of Brāhmaṇical culture was the land of the Kurus, Pañcālas, Matsyas and Śūrasenas styled by Manu as the land of Brahmarsi. Hence also the people of Magadha and Videha who did not come under full influence of Aryan culture, are included by Manu and other law-givers among the mixed castes. This Brahmarsideśa was the western part of Madhyadeśa and the pivot of the Mahābhārata. Farther east the Rāmāyana centres about Kośala ; and the Jātaka stories and the Buddhist literature, cradled in the Gangetic provinces, embraced not only the whole Prācyā and eastern Madhyadeśa but often travelled as far as Gandhāra and Uttarāpatha and sometimes brought within its purview the far east and the far south.

This maze of traditions and institutions, dogmas and realities intermingled between widely separated ages and regions baffles all consistent efforts at maintaining the time sense and the place sense in our thesis. The only relieving feature is that a remarkable identity within the divergence is noticeable on the fundamentals of social doctrines and conditions. In the midst of political clashes and religious revolutions, the social system evolved slowly and unaffected by sudden radical expositions. A new order must stand outcast and excommunicated. But if and as soon as it fought out its existence, the general tendency is marked that a compromise was made with it by the all-powerful tradition and common law and it sent a fluttering wave all over the land penetrating political and religious barriers.

Despite shortcomings, our sources open vistas and offer glimpses of a region hitherto unexplored. They reveal interesting institutions and practices at work, corporate endeavours, man's helplessness against nature, as well as his struggle—offensive and defensive, the struggle to open up her resources and to combat her freaks,—all of which conjure up behind the divine liturgies and sacrificial fire an advanced materialistic consciousness that had been long locked up in the priestly coffer of "Sacred Books".

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BOOK I
AGRICULTURE AND LAND

tato dhānya-dhanopetān dānaśīlajanān śivān
akutaścid-bhayān ramyām-ścaityayūpa-samāvṛtān
udyān-āmravanopetān sampanna-salilāśayān
tuṣṭapuṣṭajanākīrṇān gokulākulasevitān
rakṣanīyān narendrāṇām brahmagoṣābhīnāditām
rathena puruṣavyāghraḥ kośalānatyavarttata

Rāmāyaṇa, II. 50. 8-10.

Then the tiger among men left behind the villages of Kośala which were rich in wealth and paddy; inhabited by charitable men; having no cause for fear; pleasing and covered with temples and altars; adorned with parks and mango-gardens; equipped with reservoirs; thickly populated with happy and healthy folk; served by many herds of cattle with attachment; deserving of protection by kings; and resounded with Vedic chants.

CHAPTER I

PHYSICAL AND GEOGRAPHICAL BACKGROUND

The Indian soil: classification. (1) Hill tracts. (2) Deserts. (3) Alluvial soil. The river system. Ganges basin. Indus basin. The Mahānadi, the Narmadā, the Tāpti and the Godāvarī. The Dandaka forest. Meteorology, monsoon phases, climate. Nature and man. Gift of nature.

Geographical divisions. Three village types. Aryan and non-Aryans villages. The tribes and Janapadas.

The key to the economic progress of Northern India is in the long range of the Himālayas in the north which obstructs the summer monsoon and sends torrents of water down its foot-hills supplied by rains or melting glaciers, and in the two great rivers of the Ganges and the Indus which carry this water into the plains all the year round. Physically this territory, stretching down to the Godāvarī in the south,¹ is divisible into three parts: (1) the mountainous borders of the Himālayas in the north and of the Vindhya in the south with the linings of the Ghāts in the south-western and the south-eastern coasts, and the transverse range of the Aravalli hills in the centre, (2) the steppes of Sind and Rajputana extending from the coasts of the Indus up to Delhi and the Aravallis in the east, "the oldest mountain range of India,"² (3) the rich alluvium of the Indus and the Ganges mostly Aryan settlements, intervalled with large forest tracts.

¹ By the term Dakṣināpatha was understood land beyond the Godāvarī and not beyond the Narmadā. The texts frequently include principalities of the northern Deccan like Avantī, Kaliṅga, Aśmaka, Daśārṇa, Andhra, etc., among place names of Northern India.

² Imperial Gazetteer, Vol. I, p. 33.

The primordial mountains, clothed with impenetrable forest remained inaccessible for human Hill tracts. settlement. But the many foot-hills where the slopes were not prohibitive, must have been increasingly brought under cultivation and settlement. The upland valleys skirting the Himālayas include some of the most fertile of Indian low-land formation in the north-west and from historic times these were liberally "supplied with moisture by the rains and snows" (Str. XV. i. 17 ff.).

Aristoboulos noted the contrast that "rains and snow fall only on the mountains and the regions

The desert.

which lie at their base and the plains experience neither the one nor the other, and are never laid under water except when the rivers rise." This often happened during the rains and Alexander's camp and the cities assumed the appearance of sea-girt islands. Otherwise the plains were a bleak and barren lot. Aristoboulos saw no rainfall between Paṭalene and the Hydaspes and in this respect Onesicritos, Magasthenes, Eratosthenes and Nearchos do not differ from him. It is because "the mountainous and northern country was the most habitable and fertile, while the southern country was onewhere waterless and elsewhere liable to be inundated by the rivers and scorched to the last degree by burning heat, fit enough to be occupied by wild beasts, but not by human beings," that Alexander resolved "to make himself master first of that part of India which had a good report" and set his route across the land of the five rivers (*ibid*).

Of course Aristoboulos meant only the plains of the Indus and not the Gangetic plains. The The river system. regions of Delhi, western Rajputana and Sind formed a vast arid patch,¹ but the Doab, soaked as it was by the many affluents and the main stream, was a

¹ Earlier in prehistoric times the Indus had other affluents which later lost their course, among which tradition records the flow of the Saraswati even in the 6th century

fertile country and the farther lands of Magadha and Vāṅga were drenched by abundant rainfall which was stored in the great south-eastern forests. The Indian river-system, moreover, did not fail during the hot weather, for it was watered by the melting snows of the Himālayas. The climate also escaped the blighting heat of Arabia and Ethiopia for although the temperature was the same in respect of the sun's rays, India "surpassed them in having copious supplies of water, whence the atmosphere is humid, and therefore more nutritious and productive, as is equally the case with the land and the water" (*ibid.*, 22). A third point in India's favour is that unlike the Nile the Indian rivers "pour their waters into plains of greater length and breadth and lingers in the same climate" (?) thereby proving of more nutritive value than the Nile (*Ibid.*, 23).

Megasthenes and earlier Greek eye-witnesses whose memoirs were utilised for reference by Indo-Ganges valley. subsequent classical writers, were all impressed by the great rivers of India whose magnitude and number they celebrated with reckless hyperboles. The spinal cord of these watery nerves was formed by the Ganges which was the eastern boundary of the Gangaridai (Kaliṅga) and by the Indus which was the western boundary of India, both "having their sources in the mountains which stretch along the northern frontier" (*Diod.* II. 36). Each of these was fed by a host of tributaries in their mid-course, the Ganges by 17 (*Arr.* IV. According to Pliny, 19), the Indus

B.C. "Over a vast space of the now desert country east of the Indus traces of ancient river-beds testify to the gradual desiccation of an once fertile region; and throughout the deltaic flats of the Indus may still be seen old channels which once conducted the waters of the Rann of Cutch, giving life and prosperity to the past cities of the delta which have left no living records of the countless generations that once inhabited them It is...clear that the Indus was not always shut off from the Peninsula of India by such wide spaces of desert as now form a formidable obstacle to progression from its bank eastward." *Ibid.*, p. 80.

by almost an equal number (Arr. IV has 13, Strabo has 15, Pliny, 19) most of which were navigable (Arr. IV). The Ganges is said to have been 30 stadia¹ broad at the source (Diod. II. 37) elsewhere 100 stadia where narrowest, the shores being invisible from each other where the river spreads out into lakes (Arr. IV). The breadth is computed by another between 8 and 20 miles (Solin. 52.6 f.). The Indus is just inferior to the Ganges but surpasses any other river in the world. "We ought not, therefore, to distrust what we are told regarding the Indus and the Ganges, that they are beyond comparison greater than the Ister and the Nile" (Arr. IV). Altogether the number of Indian rivers is computed at 58 all of which are navigable (Diod. II. 37). Thus as Egypt is the gift of the Nile, Northern India is the making of the Indus and the Ganges, rivers of perennial water unlike their sisters in the South.

"There is not a river in the world which has influenced humanity or contributed to the growth of material civilisation or social ethics to such an extent as the Ganges."² It formed the main artery of inter-state commerce and brought down the wealth of Northern India for the carrying trade at Tāmralipti. Great Janapadas flourished on its banks. Material prosperity, political ambition and spiritual ideals were simultaneously nurtured in this plain and made it the pivot of that culture and magnificence which was India's pride.

Being within the influence of the south-west monsoon which at present accounts for almost 90 p.c. of the total rainfall, and overhung with the thick humid atmosphere of steamy effervescence which is the characteristic of Lower Bengal and of those Southern provinces which are watered by the Mahānādī, the Gangetic basin was as now green and thick with the luxuriance of vegetation. The casual refer-

¹ 1 Stadium=about 606 English feet.

² Imperial Gazetteer, Vol. I, p. 26.

ences in the Pali works conjure up the panoramic vision between the Oudh and the Delta of "a wide area of crop-producing land, broken by clustering groves of mango, tamarind and other trees, giving place gradually to long lines and avenues of palms bordering the fresh verdure of irrigated rice-fields in the lower reaches of the valley."¹

The western arm of the Indo-Gangetic depression presents slightly different characteristics from the Ganges valley. The upper Indus plain was not a flat treeless terrain as now. Its banks grew forests enough to enable Alexander to build his Indian flotilla; and about the valley of the Peshawar there were wide spaces of waterlogged and swampy plains with thick forests sheltering elephants and rhinoes. Accordingly the meteorological conditions of the Punjab valley could not have been as they are now and the terrific heat of summer and scanty rainfall must have been unknown.²

Unlike the Ganges again the Indus keeps its characteristics of a gorge-enclosed river throughout its course up to the sea. Like the Brahmaputra it builds up its bed by the deposit of silt. The gradually increasing elevation of its great silt-formed aqueduct is always a serious menace to the surrounding country inasmuch as it leads to very extensive and very dangerous floods."³ Such floods were encountered by Alexander and the memoir-writers of his campaign.

The basin of the Mahānādī differs very little from the Ganges basin in essential physical characteristics. Its rich delta no doubt contributed to the prosperity of the ancient state of Kalinga as Avantī was favoured by the estuaries of the Narmadā and

¹ *Ibid.*, p. 22.

² In the 5th century B. C., the Punjab or the Indian satrapy of Darius' Empire was the richest province and yielded a tribute of 560 talents of gold each year (£8,000,000).

³ *Ibid.*, p. 30.

the Tāpti and the Rann of Cutch in the low-lands and by the precious sheet of black cotton soil in the uplands (Peri. 41). Except for the western states of Avantī and Mālwā and the eastern ones of Aśmaka and Kalinga, the broad central plateau between the Ghāts and the Vindhya and the Godāvarī was covered by the primeval forest of Dandaka which was the more effective barrier between the North and the South than the Vindhya range or the Narmadā river.¹

Like the topography, the meteorology of India is full of variety and contrasts ; it ranges between Meteorology, monsoons,
climate. the heavy rainfall of Assam and Cherrapunji and the absolute dryness of upper Sind.² The coasts are exposed to fierce cyclones hardly known in Europe, bringing storm waves that sweep the low coast-land of lower Bengal and the deltas of the Mahānadī and the Godāvarī destroying the crops and drowning the inhabitants. The monsoon phases of India are pronounced and their contrast is more marked than anywhere else. During one half of the year, the term of the North-East monsoon, it is swept by dry land winds with little cloud and rain, and during the other half, in the South-West monsoon time, it is blown by winds of oceanic origin with high humidity, much cloud and frequent rain. These factors are connected with a noteworthy combination of tropical and temperate region conditions. "Tropical heat, heavy and frequent rain and fierce cyclones are prevalent at one period of the year ; while moderate temperature and rain, with shallow, exten-

¹ The Rāmāyaṇa account interposes the forest in the vast gap between Avanti, Vidarbha, Matsya and Kalinga in the north and Andhra, Pūṇḍra, Cola and Pāṇḍya in the south (IV. 41).

² According to the Arthaśāstra, rainfall in the country of Jāmgala (desert countries) is 16 *dronas*, in moist countries (*anupānām*) 24 *dronas*, in the Aśmakas (Mahārāṣṭra) 18½ *dronas*, in Avantī 23 *dronas*, in the western countries (*Aparāntānām*) and the Himalayan borders an immense quantity. II. 24.

sive storms, conditions resembling those of south-eastern Europe, obtain at another.”¹

The natural surroundings, therefore, did not promise the
Nature vs. man. Indian too easy a life. Among those who

believe that Indians were never hard fighters against nature nor ambitious for material prosperity, it is a common stock of argument that while in temperate regions an economical nature yields nothing save in response to hard labour, in the tropics, nature except for sudden vagaries supplies the necessities of man with very little strain on his part and this promotes inertia and fatalism. An economist has refuted this theory and upheld that “the greater the fertility, the greater the incentive to skill”;² and the contention is amply borne out by the early economic history of the Gangetic provinces. The preachers of “oriental apathy” moreover overlook the fact that India is not uniformly a tropical region and nature is not as munificent as it is supposed to be.³ Within the boundaries of the northern sector almost any extreme of climate that is known to the tropics or the temperate zone may be found. Throughout its major portion rainfall is precarious and the lands of Upper Sind and western Rajputana must have suffered under chronic drought and depended entirely on irrigation as now. The marked discontinuity of Indian rainfall and its confinement to certain definite seasons causes shortage of soil moisture, soil erosion and water-logging and so flood has always been a serious natural enemy which

¹ Imperial Gazetteer, Vol. I, p. 105.

² A. M. Carr-Saunders—The Population Problem, p. 422.

³ “For ages the Indus has been pushing its bed across the valley from east to west, generally by the gradual process of erosion, which effectually wipes out every trace of town and village on its banks, but at times also by a more or less sudden shifting of its waters into entirely new channels, leaving large tracts of country to go to waste, and forcing the inhabitants of many a populous place to abandon their old homes, and follow the river in search of new settlements.” J.R.A.S., Vol. XVI, p. 281. See Strabo, XVI, i. 19.

calls forth all the nerve and ingenuity that man is capable of.

From the diversity of her physical features, India came to possess a great variety of animal, vegetable and mineral products ; the thick-coated hill sheep of Kashmir, the camel of Sind and the elephant and tiger of Bengal forest ; the wheat, fruit and fir trees of the north and the rice and cocoanuts of the hot low-lying swamps and coastal regions ; the coal and ironfields of Bengal, Bihar and Orissa and the gold of Mysore and the salt ranges of the Punjab. The density of population and the economic habits of the people have also varied greatly, influenced by diverse physical conditions ; the peaceful agriculturist of the Gangetic valley, the hard-working Deccanese, the shepherd hillmen of the Himālayas and the primitive huntsmen of the forest regions —all live side by side on the Indian soil.

During the period under study, villages may be classified into three economic types. The main and the majority were those which grew out of an intermixture of the Aryan and non-Aryan settlers founded chiefly on agriculture.

Three types of villages. The habitat, centred round the patron deity of the villages, was encircled by the *gāmakhetta* or cultivated field outside which lay forests and pasture grounds. Of a different type were the *paccantagāma* or border villages inhabited by aboriginal or degraded tribes. These people occupied also the slopes of the Himālayas, the Vindhya and the Aravallis even as now as well as the trans-Gangetic regions where Ptolemy locates all non-Aryan tribes with a thin sprinkling of Brāhmaṇical settlements. In the Mahābhārata native and foreign barbarians like the Kirātas, Dāradas, Cīnas, Sakas, etc., and outcasts like the Bālhikas, Madras, Prāgyotiṣas, etc., are seen distributed along a semi-circular arch from Sind to the Bengal Delta (*cf.* Baudh., I. 1. 2. 13-15). Outside the 16 *Mahājanapadas* of the Anguttara-nikāya land was mostly occupied by the

aboriginals. As land of the superior grade was appropriated by the conquerors, the original settlers were pushed into the marches where land offered little attractions to the cultivator. These people accordingly led a bohemian life upon freebooting, hunting and pastoral enterprise. The third type consisted of industrial and professional villages, *i.e.*, villages founded on a particular trade or profession, the inhabitants whereof specialised in a particular art and catered to the needs of neighbouring districts.¹

Cunningham, following Yuan Chwang and the official records of the Thang Dynasty of the 7th century, has divided the Indian continent into five Indies, *viz.*, North, West, Centre, East and South.² These correspond respectively to the fivefold division given in the Kāvyamīmāṃsā and in the Bhuvanakoṣa section of the Purāṇas, *viz.*, Udīcya (Pali—Uttarāpatha), Aparānta (Pali—Aparāntaka), Madhyadeśa (Pali—Majjhimadesa), Prācyā and Dakṣināpatha (Pali—Dakkhināpatha).

The Anguttara-nikāya enumerates sixteen Mahājanapadas, *viz.*, Kāsi, Kosala, Aṅga, Magadha, Vajji, Malla, Cedi, Vānsa, Kuru, Pañcāla, Matsya, Surasena, Assaka, Avantī, Gandhāra, Kāmboja (I. 213 ; IV. 252, 256, 260). Between the similar lists of the Karnaparva of the Mahābhārata and of the Janavasabha Suttanta of the Dīghanikāya, this is the most exhaustive. The Jaina Bhagavati Sutra shows a wider horizon of a later time. In the Bhiṣmaparva of the Mahābhārata as many as about 150 tribal or place names are recorded for northern India (9. 38 ff.). But the list is of very little use, vitiated as it is by mythical names, duplications and triplications, juxtaposition of old and late names, etc.

¹ The first type comes within the purview of this Book. The villages of robbers and the hunters are treated in Book V, Ch. III, of the *Candālas* and degraded castes and professions in Book VI, Ch. III, the industrial villages in Book II, Ch. V.

² Ancient Geography of India, pp. 11 ff.

Of the 16 *Mahājanapadas* of the Anguttara-nikāya as many as 12 flourished in the Ganges valley. Only Gandhāra and Kāmboja are seen in the Indus valley, Avantī on the Narmadā and Assaka on the Godāvarī. Other important *janapadas* or tribal settlements whose existence was not merely imaginary and which may be located with approximate precision are Bālhika and Surāṣṭra in Sind and Gujarat, Madra in the Punjab, Daśārṇa in the Central Provinces, Vidarbha in Berar, Puṇḍravarddhana in Western Bengal, Vāṅga in Eastern Bengal and Kalinga which included Orissa and northern part of the Madras Presidency. Besides, the Greek writers give a long list of petty principalities in Sind and the Punjab.

Except for the inscriptions, which are moreover few and taciturn, all our sources are confined almost exclusively to the description of the Madhyadeśa which stretched between the Kuru country and the Puṇḍravarddhana. Information about the people of the Punjab, Sind and trans-Gangetic regions are meagre, coloured with prejudices and garbled with legends. Megasthenes himself was trapped into the old wives' tales regarding some of these peoples which were current among the people of the Madhyadeśa. The fabulous stories about the Madras and the Bālhikas in the Epics is a sad contrast to the realistic picture of the Magadhans and Kosalans in Pali literature and until streaks of light radiate from the inscriptions in the rock-caves of Karle, Nasik, Junagadh, Hathigumpha, etc., the reader remains almost in the dark about local institutions and enterprise and the stages of economic development.

CHAPTER II

THE AGRARIAN SYSTEM

Theories of peasant, communal and state ownership of land. Ownership and possession—right of transfer. Individual ownership with rights of transfer; significance of Karla and Nasili charters. Communal ownership; Baden Powell's theory. Theory and practice of royal ownership; scope of royal title. Royal domains. Partnership of rights and title between Crown, community and cultivator in ordinary land excepting land under sole authority of Crown or community.

Big and small estates: agricultural indebtedness. No privileges based on land.

The difference of scholastic opinion over the land system of the Indo-Aryans has not been narrowed down with the progress of research on the subject since the memorable works of Maine and Baden Powell inaugurated the controversy. There is no dearth of ancient authorities for every rival opinion to substantiate its claim that the land system was founded on individual, communal or royal ownership. These conflicting theories and facts in our literary material rule out the convenient solution of labelling for a vast country where different cultural and racial units fused together or thrived in isolation and lead to the only safe conclusion that "different villages in different districts varied one from another in the customs of land-tenure and in the rights of individual householder as against the community."¹

Doubt has even been raised whether the conception of ownership of agricultural lands had at all been reached when the Sacred Law was formulated² and the contention has been competently fought by an Indian scholar.³ As has been

Ownership distin-
guished from possess-
ion.

¹ Rhys Davids—Buddhist India, Ch. III.

² Moreland—Agrarian System of Moslem India, p. 4.

³ Ghoshal—Agrarian System in Ancient India, Lec. V.

pointed out, the Sacred Law distinguishes even in respect of terminology the idea of ownership from that of restricted real rights : ownership indicated by *svatva*, *svāmītva*, etc., possession by the root *bhuj* and its derivatives. The field belongs to him who first removes the weed as the deer to him who first stalks it.¹ Though mere possession as distinct from ownership is implied in this injunction, it recognises the right of first clearing as constituting the original title to the land. This distinction between possession and title is repeatedly emphasised in later law books (Yāj II. 29; Vṛ. IX. 2 ff). Mediaeval law-digests explicitly define ownership as the quality of the object owned, of being used according to pleasure. The Smṛtis further testify that the essential attributes associated with ownership are sale, gift and mortgage (Gaut. XIX. 17; Baudh. III. 10. 15; Manu, X. 114; Vṛ. VIII. 6 f.; Arth. III. 9); an owner might also use land as pledges (Manu, VIII. 143; Nār. I. 125. Asahāya's commentary).

An examination of literary matters shows that individual ownership of agricultural and homestead land stood the application of these tests.²

Individual ownership in Pali works
It is a common warning in canonical works that a genuine *bhikkhu* has no sons, animals, arable or homestead land,³ i.e., the movable and immovable property as generally belongs to the householder. The implication is clear that land is as much personal property as cattle. The *khetta* and the *vatthu* also figure along with *hirañña*, *suvanna*, *gāvi*, *dāsa*, *bhariya*, etc., as gifts that may be

¹ *Sthāpucchedasya kedāram āshūḥ śalyavato mrgam* : Manu IX. 44. See also Kullūka's comment on it.

² Vedic Aryans at the dawn of their history exhibit instances of full-grown private proprietorship. See Macdonell and Keith : Vedic Index, I. 211. Also N. C. Banerji : Economic Life and Progress, pp. 100 ff.

³ *na tassaputta pasavo vā khetamp vatthum na vijjati*. Sut. IV. x. 11. In the Kāmasutta this ownership is spoken of in positive form (IV, i). Cf. Jāt. II. 99. ; Mbh. XII. 296. 3; Jacobi : J. S. II, pp. 59, 90, 847.

offered to a *bhikkhu* by a woman, a harlot, an adult girl, a eunuch, a king, a robber and a rascal (Mv. III. 11. 4 ff. ; cf. Mil. p. 279; Therag. 957). The passage illustrates not only a ripe sense of ownership but also that there was at least no strict and universal sex-barrier against ownership of land of which Ambapāli and Visākhā Migāramātā are concrete examples (Therig. 340). A parable in the Milindapañhā illustrates how acquisition of land by clearance of forests tended to develop into a legal title :

“ It is as when a man clears away the jungle and sets free a piece of land and the people say—‘ that is his land.’ Not that the land is made by him. It is because that he has brought the land into use that he is called the owner of the land.”

“ Yathā.....koci puriso vanam sodhitvā bhūmim nīharati tassa sā bhūmīti jano voharati na c'esā bhūmi tena pavattitā tam bhūmim kāraṇam katvā bhūmisāmiko nāma hoti.” P. 219.

Similar instances of private appropriation with reclamation of forests is seen in the Jātakas (IV. 167) and the Epics (Rām. II. 32. 30). A glimpse into the legal origin of individual ownership is afforded by the tradition embodied in the Jātaka stories where the deer eat up the crops of villagers and an understanding is reached between the man king and the deer king to the effect that each man should mark out his plot and set up a placard therein so that the deer folk might distinguish it from unclaimed land and spare it (I. 153; IV. 262 f.). A Brāhmaṇa landowner of Magadha offers 1,000 *karīsas* of his estate as a gift to a parrot (IV. 281). The Jātakas record the donation of parks by the doctor Jīvaka at Rājagaha, by the courtesan Ambapāli at Vesāli and by the merchant Anātha-pindika at Sāvatthi who, moreover, gives the pleasance after purchase from prince Jeta thus showing a double process of private transfer. Elsewhere Bodhisatta is seen

to form an estate outside his native village which indicates that alienation of land by sale, mortgage or otherwise was not unknown (III. 293) and that land had acquired a certain measure of fluidity. The story which relates how Bodhisatta remonstrated a *gahapati* who murdered his nephew to be owner of an undivided estate and concluded his sermon by uttering a verse to elucidate how silly it was to guard one's fortunes whimpering 'mine, mine' all the while (III. 301 f.), sets at rest all doubt as to whether a clear notion on the concept of ownership in land had grown up as yet.

The transaction between Anāthapiṇḍika and Jeta is of unique interest to bear quotation.

Anāthapiṇḍiko gahapati.....Jetam kumāram etad avoca :
dehi me ayyaputta uyyānam ārāmam kātun
Land suit over ti. adeyyo gahapati ārāmo api koṭi-
Jetavana. santharenā 'ti. gabito ayyaputta ārāmo 'ti.
na gahapati gabito ārāmo 'ti. gohito na gabito 'ti
vohārike mahāmatte pucchimsu. mahāmattā evam āhamṣu :
yato tayā ayaputta aggho kato gabito ārāmo 'ti. atha kho
Anāthapiṇḍiko gahapati sakaṭehi hiraññām nibbāhāpetvā
Jetavanam koṭisantharam santharāpesi." Cv. VI. 4. 9.

Evidently Jeta's answer to the offer of purchase is misreported here for on the merit of this the law-suit cannot go against him. Buddhaghosa in his commentary Sāmantapāśādika gives the correct report based upon some older Indian legend which the Bārhut sculptor had before him. From this version as well as the Bārhut representation it appears, moreover, that Anāthapiṇḍika took Jeta at his word, took possession of the park and asserted his right of ownership by going so far as to cut down all the trees except one mango and a few *candana* trees.¹ The bargain, the taking of possession, Jeta's ultimate backing out,

¹ Hardy : Manual of Buddhism. p. 218 f. Barua : Bārhut, II, p. 31.

reference to law court¹ and the judicial verdict are all unmistakable cases in point of legal ownership of the individual and transfer of right by sale.

Cursory and allegorical references in the Dīgha-nikāya corroborate the foregoing conclusion. It significantly remarks on the ‘division of rice-fields’ and setting up ‘of boundaries between the two’ (sattā sālim vibhajimsu mariyādam thapesum, XXVII. 18) and on the stealing of another’s plot (khetta, *ibid.*, 19).² In a parable Buddha derides the folly of “a man who neglecting his own field should take thought to weed out his neighbour’s field” (sakam khettam ohāya param khettam niddayitabbam, XII. 7). This became an oft-quoted expression to laugh down a fool, for the sarcastic analogy occurs in the Mahābhārata as well—parakṣetre nirvapati yaśca vijam (V.36.5).

Gift of land is classed among acts of exemplary piety in the Epics (Mbh. III. 199. 127 ff.). The imprecatory verses of the Mahābhārata directed against those who revoke grants or infringe rights of land once transferred (XIII. 62; V. 36. 13) are conventionally and meticulously repeated in the land-charters inscribed on stone and copper-plates. There is no reason why an act of grace which would be salvation for the royal race should not be the same for humbler folk (Rām. III. 68. 29; VII. 28. 21; Mbh. XIII. 23. 111; 62).

According to Āpastamba land might be let by an individual against a certain share of the produce (kṣetram parigrhyo' tthānābhāvāt phalābhāvē yah samṛddhaḥ sa bhāvi tada-parihāryaḥ, II. 11. 28. 1.1; cf. I. 6. 18. 20). Vyāsa and

¹ That civil suits over dispute on land were not infrequent is pointed out by the Milinda parable (p. 47) where a *khettasāmiko* litigates against another who burns his field. Cf. Baudh. I. 10. 19. 12; II. 1. 2. 4; Arth. III. 9.

² The dispossessor of another’s plot is one of the six varieties of *ātatāyin* according to the commentator on the Mahābhārata : V. 178. 1; Cf. Yāj. II. 155; Arth. III. 9, 17; IV. 10; Gaut. XIIT. 17.

Vṛhaspati also imply the leasing of fields in the same manner. Similarly the Arthaśāstra lays down that if a holding is taken possession of by another on some reasonable grounds, he shall be made to pay the owner some rent, the amount of which is to be fixed after mature consideration of what is necessary for the subsistence of the cultivator of the holding for him (karaṇādane prayāsam ājīvam ca parisaṃkhyāya bandham dadyāt, III. 9). In contrast to the rule on royal land, the indifferent cultivator does not forfeit his plot: the man who makes improvement on another's neglected plot must surrender it after five years to the owner on obtaining a compensation (anādeyam akṛṣato 'nyah pañca varṣāny-upabhujya prayāsa-niṣkrayena dadyāt, III. 10).¹

Early epigraphic records give scanty but illuminating data. An early instance of private transfer is furnished by Dharmanandin, son of an *upāsaka* who made a bequest of a

Significance of Karle
and Nasik Inscrip-
tions. field for the clothes of some ascetics living in one of the Nasik caves (No 9.

pl. iii). In the Karle Cave Inscriptions, Usavadāta's assignment of 16 villages to *devas*, Brāhmaṇas and ascetics seems to imply only the assignment of revenues for allowing peaceful pursuit of spiritual avocations—not the transfer of ownership or right of alienation by sale, mortgage or gift as is customary in later land-charters. A similar gift to the Bhadāvaniya sect of the *samgha* is recorded in the Nasik Cave Inscription 2. i. The following plates are more interesting and deserve more than passing notice. The charter of Vāśiṣṭhiputra Pulumāyi

¹ If these rules were meant for practical application, the existence of a class of under-ryots with a corresponding type of landlord who is proprietor of the soil, may be presumed. But in view of lack of records, it would be rash to draw an analogy with the present zeminary system with its paraphernalia of *zutdārs*, *pattanidārs*, etc. Absence of corroborative reference in the Jātakas and popular literature shows that there was no widespread subinfeudation of land in any sense.

is marked by three characteristics: (a) the village is assigned "to be owned by the *bhikkhus* . . . dwelling in the cave to produce a perpetual rent for the care of the cave" (*bhikhuhi devileṇavāsehi nikāyena Bhadāyaniyehi patigaya dato*), (b) with customary immunities belonging to monks' land (*bhikhuhalaparihāra*) free from the entry of royal officers and the police, *i.e.*, from revenues and fines¹ and from the royal monopoly of salt. (c) The king's right to abrogate the grant substituting another in its stead is implicit in the donation (3. ii). With exactly the same immunities a field of 200 *nivartanas* in a village is assigned to the Tekirasi ascetics by Gautamiputra Sātakarṇi (4. ii). In both cases the donor is a king, the donee a religious order, the immunities are the same, but in the former case the gift is a whole village, in the latter only a *Khetta*. The nature of the grant cannot be the same in the case of a village (with its population of cultivators) and that of a cultivated field thereof, however, conventionally the immunities may be repeated. The contrast is boldly marked out by another writ of Gautamiputra Sātakarṇi which directs that since a field in the village of *kakhadi* granted to certain ascetics was not cultivated, nor the village inhabited, 100 *nivartanas* of land from the same be given to the ascetics with customary immunities (5. ii). The field is explicitly characterised as a 'royal field' (*rājakam kheta*). The probable explanation is that originally only the revenues of the crown land were assigned (the ownership indicated in 3. ii must be understood in this sense) but since the village was depopulated for some reason or other and the field remained untilled and produced no revenue to be enjoyed, the king assigned a portion thereof with complete rights of a beneficiary and usufructuary—and

¹ Cf. *adāṇḍakarāṇi* in the Arthaśāstra, II. 1.

if we may hazard the suggestion, as a *brahmadeya* gift of land.

The implication and upshot of these instances are that the king's charter might bear on private land or on crown

Right of free-holders not infringed by royal grant. land. In the first case it was only a matter of transfer of revenue over which

the king had undivided legal right, and not of ownership and usufruct. In the second case, the assignment is only of revenue when whole villages are disposed of along with the tillers and their holdings, and of ownership and usufruct when the gift consists of a few acres of land.¹ The right of freeholders stood unimpugned in the case of transfer of land which was not crown property.² This is proved by the grant of Usavadāta (10. iv) in which a field was bought from a Brāhmaṇa "belonging to his father" for the price of 4,000 *kahāpanas* and "from it food will be procured for all monks dwelling in my cave."³ This is why the *brahmadeya* gift of land which carried with it ownership and usufruct and not merely revenue, could be made only of crown lands (Dn. III. i. 1; IV. i. 1; XII. i. 1; Mn. 95; Arth. II. 1). This was the general custom and order prevailing not only in the Deccan under Sātavāhana rule but according to all extant testimony, also in the Indo-Ganges valley from much earlier time down to a few centuries of the Christian era.

¹ Distinctive gifts of land and villages occur side by side in the Mahābhārata, XIII. 10. 62; 23. 111.

² We shall see that in crown lands there were no freeholders but only king's tenants and agricultural labourers.

³ Cf. a Tamil inscription of Kṛṣṇa III wherein the king assigns land to a god after purchasing it from the members of a village assembly. Ep. In. VII. 20G. These are definite recognitions of personal and communal ownership with rights of transfer by sale, etc.

But peasant-proprietorship was not the uniform and universal principle of land tenure. Although Maine's analogy with the Teutonic mark¹ is now universally discredited, Baden Powell's theory of undiluted private ownership² supported by most of the modern scholars does not stand close examination. As observed by Washburn Hopkins—“The general Hindu theory of imparible real estate is a distinct blow to the sweeping generalisation made by Baden Powell when he stated that the early Aryans in India recognised only private ownership in land.”³ The early jurists like Gautama, Manu, Uśanas are very reticent about partibility of land.⁴ It is only later jurists of the 4th and 5th centuries who recognise land to be partible. It may be noted also that while Manu's boundary laws open with rules for the adjustment of boundaries between disputing villages (X), the subsidiary law in regard to boundary lines of a field, spring, reservoir, garden or house being added only as an appendix, Yāñavalkya reverses the order laying down ‘the law in regard to fields’ and adding that ‘the same applied to villages.’ An interesting admonition from a sage to his brother in the Mahābhārata on the evils of partition of patrimony which encourages quarrel, estrangement and ruin reflects the working of this tendency, i.e., how ownership of the joint family (which is conterminous with joint village in patriarchal society) was sought

¹ “The Indian and the European systems of enjoyment and tillage by men grouped in village communities are in all essential particulars identical”—Village Communities of the East and West, p. 103.

² Indian Village Community. Article on Origin of Village Land Tenures in India, J.R.A.S., Vol XXX.

³ India—Old and New, p. 218.

⁴ This must not be taken to mean that partition of estates was totally unknown. The Rg-veda bears witness that the son's right in real property was implicit even in father's life-time and could be exercised in partition, the right which is the basis of the *Mitākṣarā* system of the law of succession (*cf.* Ait. Br., V. 14; Tait. Sam., II. 6 1).

to be maintained by wise counsel against the encroachment of partition and full-fledged private individual property (I. 29. 16-22).

The tradition of unrestricted communal ownership on soil was handed down from hoary antiquity from the region of the extreme north associated with the Uttarakurus who were proverbial for their piety and wisdom (*kṛtapunya-pratiśrayaḥ*, Mbh. VI. 6. 13.). These idealised folk called no goods their own, nor women their chattels and their crops were yielded without toil, so goes the pæan of praise in the *Dīgha-nikāya* (XXXII. 7). In the same vein Vaiśampāyana describes the Kuru land in the good old days of Duṣmanta (Mbh. I. 68). Nor was the custom confined to the north-west or to pre-Buddhistic times. In the *Tinḍuka Jātaka* a fruit tree appears among the corporate property of a village (II. 76 f.). In the *Sīha-camma Jātaka* a *yavakhetta* where an ass is let loose by a sharper and which is defended by all the villagers in a body seems to be common village property unless of course this be a field under collective farming (II. 109 ff.). To the village corporation belonged the village pond (*candanikam*), the motehall (*sāla*) and irrigation tanks and canals, roads, bridges, parks, etc. (Jāt. I. 199). The *Jātaka* evidences also leave no room for doubt that the ill-defined belt of pasture land around the *gāmakhetta* was enjoyed and owned by the villagers in common (cf. Rv. X. 19. 3f.). According to Manu the land around a village on all sides for 100 bows (about 600 ft.) is common land (VIII. 237 f.). According to the *Arthaśāstra* this is 800 *angulas* (III. 10).

The brief story in the *paccupannavatthu* of the *Kunāla Jātaka* throws a vivid sidelight on the agrarian system in certain aristocratic republics. In aristocratic republics (V. 412 f.). The Sākyas and the Koliyas each cultivated their tribal land held in common

enterprise and organisation by means of a dam from river Rohini worked by co-operative irrigation. The owners proper of the land were the *rājakulas* or aristocratic families. They had subordinates to work the estates or manage the administration (*tasmim kamme niyutta amacca*). To this category of intermediaries belonged the *sevaka*, *bhojaka*, *amacca* and *uparāja* (cf. Jāt. I. 504). The actual labour was done by slaves (*dāsi*, *dāsa*) and hired hands (*kamma-karā*) who fell to quarrel on behalf of their masters over the prior claim to the waters. The *rājakulas* together with their vassals and officers formed the tribal body or body-politic and the slaves and serfs are left out when the Sākyas and Koliyas are mentioned. The latter version of the dispute significantly makes the partition—‘*dāsa-kammakarā c'eva sevakabhojakāmacca uparājāno ca'ti sabbe yuddhasajjā nikhamimsū*.’

This supposition is strengthened by a passing observation in the Mahāvastu. The Sākyas give their incoming sisters' children ‘Sākyas wives, cultivated lands and villages.’¹ The presumption is that land was held in common between the *rājakulas*, members whereof either parcelled out portions to others on tenancy or held plots in usufructuary enjoyment.

Speaking of certain unspecified tribes, probably of the Punjab, Strabo notes that “the land is cultivated by families in common and when the crops are collected, each person takes a load for his support throughout the year” (XV. i. 66). In the Arthaśāstra, land owned by village community is hardly traced. But like the Smṛtis it deals not only with boundary disputes between individuals but

¹ See B. C. Law : Study of the Mahāvastu, p. 57. The Mahāvastu and the Jātaka commentary are of course both later works. But the joint-family ownership must have been a feature of the oligarchical and corporate life associated with the Sākyas clan from much earlier time.

also between villages which are to be settled by elders of 5 or 10 villages (III. 9). The significance In the Arthaśāstra. of such village boundary, however, is not made clear. Had the village community the right to collect some taxes within its jurisdiction ? The probability is strengthened by the rule in next chapter that the fine levied on a cultivator who arriving at a village for work does not abide by the contract shall be taken by the village itself (*karṣakasya grāmam abhyupetvā kurvato grāma evātyayam haret*). It would be rash to infer the leasing of communal land to an outside cultivator from this meagre statement. It would rather suggest a system of collective farming in which workers were employed under a co-operative enterprise for cultivation of the villagers' fields.

After laying down that no bidding must be done in the absence of owner, the Arthaśāstra gives another law, '*saptarātrād-ūrddhvam-anabhisarataḥ pratikruṣṭo vikrīṇita*' : "if the owner does not come forward even on the expiration of seven nights, the bidder may take possession of the property." Reading this with the rule in next chapter (III.10)—'*akaradāḥ paratra vasanto bhogam upajīveyuh*'—“non-taxpayers (*i.e.*, owners of *brahmadeya*) shall retain ownership even if they sojourn abroad,”—it seems that an owner (taxpayer) lost his title to the *vāstu* if he left it for a foreign land and remained untraced for seven nights, when the villagers in a body, represented by the elders, might dispose of it.

Thus although in the land system of the Arthaśāstra In later Inscriptions. communal ownership was obviously on the wane, it still had lingering traces which restricted real rights of cultivators. Nor was it totally extinct in any period in the ancient economy of northern India not to speak of the Tamil countries of the far south. A Gwalior Inscription of as late as the 9th century

records a temple grant by a town of plots of land "which was its own property (*svabhuñjamāna*, *svabhukti*) specified as belonging to village so and so and cultivated by so and so (*memmakavāhitakṣetram*).¹ Here obviously the corporate person is the legal owner and the cultivator only a tenant.

A few copper-plate documents of Bengal from the 5th and 6th centuries recording purchase and gift of land lend strength to this supposition. In some of these the intending purchasers, official or non-official, had to address in their application for purchase not only the administrative functionaries of the province (*bhukti*) and the district (*viṣaya*), but also the leading man or elders in the same, as well as the other rural officers, *e.g.*, *aṣṭakulādhikarāṇas*, *grāmikas* and the chief householders (*kuṭumbins*), while in others the purchasers approached with their application the administrative machinery of the district town which had a Board or Council attached to it consisting of the representatives of the four important interests of those days, *viz.*, the merchants, the traders, the artisans and the scribes or Government secretaries. Sometimes the documents bear the seal of the two Government courts, *viz.*, that of the district of *Vārakamandala* and of the district town of *Koṭivarṣa*. The land for sale is cultivable field (*kṣetra*), homestead land (*vāstu*) or waste land (*khila*). Who were the owners of these lands ? R. G. Basak pertinently asks that if they belonged to the state, "why it could not alienate them without the consent or approval of the peoples' representatives, the *mahattaras* and the businessmen (*vyavahārin*) of the province and the district and sometimes even the common folk ?" Moreover, why should the state, in a sale of land which is absolutely its own, get only 1/6 of the sale proceeds as is clearly

¹ Ep. In. I. 20.

mentioned in one of the documents ? It seems clear that the remaining 5/6 went to the funds of the village assemblies who formed a party with Government in granting prayers for purchase and that there was a joint ownership of land between the state and the village community—a state of affairs very similar to that prevailing in the village economy of the far south.¹

Baden Powell's arguments against communal ownership.

Baden Powell tries to establish his theory of peasant ownership by examining the character of the severalty and the joint villages which are distinguished from one another

by the following features. The former has a *patel* or headman, the latter none. The former has holdings which have always been separate, the latter has holdings which are only inherited shares of an original single estate. In the former each holding is assessed separately, the latter has a joint liability, the revenue being assessed at a lump sum. The joint village is of three types. In the tribal or clan type, members hold shares separately, there being only united ownership of waste land and of the village site, and a united responsibility for taxes. Such a tribal allotment has actually been the starting point of the true severalty village, as shown by the primitive Kolarian village. The associate joint village is founded by different families for the purpose of mutual protection against intruders and are joint only in assuming a united responsibility for taxes. The ancestral joint family village is the only unit resembling a village community. Here all the shares are portions inherited from an original single estate. The heirs hold the property always liable to division, so that there is no communal holding even though a few of the heirs do not partition their estate. Still less does the whole village own the land which is

¹ See R. G. Basak's illuminating article on Land Sale Documents of Ancient Bengal in Asutosh Silver Jubilee Volumes, Vol. III, Part II.

generally rented to tenants, the rents being divided among the descendants of the original lord of the manor. Even when the estate is undivided each heir is actually in possession of a special part and holds it for his own benefit.

According to this analysis the types are severalty and joint villages, not communal types. The most communistic form is the still undivided inheritance of a joint family, but even this is always partible. It is concluded therefore that "the joint family with its original common ownership of land is sufficient to account for all such traces of communistic landownership as we have any record of, and the joint ownership of the village had only the form of the modern 'joint village.'¹ This proposition, however, founded on a hypothesis of consanguinity, is applicable to the tribal oligarchies noted above, but is too generalised to meet all conditions. During the period under study, patriarchal villages are not the general order of society. It is no exception that families of different castes and professions are sometimes grouped in village settlements and do not shed off their communal tinge withal. Nor is joint ownership by industrial guilds or religious fraternities a rare feature in Indian land system.

Taken together, the available data do not warrant Rhys Davids' conclusion that in Buddhist India the peasantry were only shareholders in communal land without rights of sale, mortgage or bequest of their share.² The utmost that can be assumed with safety is that "the old tradition expressed in the Brāhmaṇas.....may have survived in the

¹ Legacies of communal ownership.

¹ Washburn Hopkins : *op. cit.*, p. 229.

² Rhys Davids : *loc. cit.* He is misled by the term *gāmakkhetta* and by its analogy with the Buddhist patchwork robe to think that it was "the common property of the village community " divided only for purposes of cultivation (*Vin. Texts*, Vol. II, pp. 209 f. fn., 12).

villages as a communal anti-alienating feeling concerning any disintegration of the basis of their social and economic unity."¹ Although alienation of private land to an outsider may not have been totally unknown this was against custom and law. In the Mahābhārata selling of land is categorically stigmatised as sin (XII. 78. 2.). The Arthaśāstra explicitly rules that holdings (*vāstu*) may be sold only to kinsmen and neighbours (*jñātisāmanta*, III. 10). This is the unwritten law in many parts of rural India even today. Consent required of the village community for alienation of private land may have been in some quarters another vestige of village ownership.

Thus from the earliest times communal ownership thrived side by side with private ownership Emergence of royal title. in a modified form. The evidence of the

Rgveda shows that the arable land was held in individual or family ownership while communal ownership was confined probably only to the grasslands lying on the boundaries of the fields. Originally the king's title to ownership of all land was identified with the communal title, he being the communal head or lord of the *vis*. With the advance of royal power and bifurcation of communal and royal jurisdictions he emerged as a third factor in the land system and developed certain prerogatives over the soil as reflected in the Brāhmaṇas. In the Śatapatha Brāhmaṇa it occurs that to whomsoever a Kṣatriya with the approval of the people or clan grants a settlement, that is properly given (VIII. 1. 1. 8; 1. 73. 4). Evidently public land of the folk or state is meant and not private land of freemen; and it appears that while gift of such

¹ Mrs Rhys Davids : Cambridge History of India, Vol. I, Ch. VIII. Land sale documents of Bengal in the 5th century testify that sale of land was generally accompanied with the condition of non-transferability (*nividharma*) although exceptions were made in particular cases. See the Dhānāidha and Dāmodarpur Copper-plate Inscriptions of the time of Kumāragupta I.

land with tribal consent was customary law, it was sometimes arbitrarily disposed of by the ruler—thus generating a tendency to reduce public lands to king's private estates which is encouraged by all possible means in the Arthaśāstra.

This royal pretension hardened into a theory promulgated consciously by a royalist school or unconsciously by lawyers and economists to justify king's right to a sixth of the produce for protection of his subjects; and this royalist theory attained enough force to mislead foreigners from the East and West who visited India, as well as some modern scholars¹ into a belief that in India all land belonged to the Crown. This royalist theory led to the perverted derivation of *khattiya* (Dn. XXVII. 21) in the Pali canon, " khettam patīti kho khattiyo." The king is entitled to half of ancient hoards and metals underground by reason of his giving protection and of being the master of land—so says Manu (bhūmer adhipatir hi saḥ, VIII. 39). A śloka quoted by Bhaṭṭaswāmī in the commentary on the Arthaśāstra (II. 24) goes : " Those who are well-versed in the Sāstras admit that the king is the owner of both land and water and that the householders can exercise their right of ownership over all other things excepting these two."

Rājā bhūmeḥ patirdṛṣṭah sāstrajñai rudakasya ca
Tābhyām anyattu yaddravyam tatra svāmyam kuṭumbinām.²

Megasthenes aligned with this tradition when he stated that all India is the property of the Crown and no private

¹ Vincent Smith : Early History of India, pp. 137 ff.; J. N. Samaddar : Economic Condition of Ancient India, p. 56.

² Note that *pati* and *svāmī* appear synonymously. K. P. Jayaswal (Hindu Polity, II, p. 182) translates *pati* as protector and reads *svāmyam* as *sāmyam*, thereby twisting the meaning of the later half to " the people have equality of rights over all other things." While *pati* may be used in the sense of ' protector,' *sāmyam* is not the accepted reading and T. Ganapati Sastri, Shamasastri and Jolly-Schmidt have all adhered to the reading given above.

person is permitted to own land (Diod. II. 40; Str. XV. i. 39-41, 46-49). The Chinese travellers knew no better.

That this titular right was sometimes sought to be actively asserted is proved by literary tradition of diverse sorts to the effect

Assertion of royal title.

that the king might lay hand on individual property or real estate in the name of emergency at his sweet will (Jāt. III. 301 f.; Mbh. III. 2. 39; Rām. I. 53. 9 f.) without the retribution of the Jewish king who despoiled Naboth of his vineyard. The Arthaśāstra indicates that the king sometimes exercised the overriding authority and confiscated land (I. 14)¹ though it caused resentment and alarm thus creating a situation inviting to a foreign enemy. In the Rāma story as repeated in the Mahābhārata, Daśaratha claims before Kaikeyī that all property in his domain except that belonging to Brāhmaṇas is his, and he can confiscate anybody's wealth :

Dhanam dadāmi kasmād hṛyatām kasya vā punah
Brāhmaṇasvād ihānyatra yatkīñcid vittam asti me

III. 275.23.

This is an echo of the Vedic teaching that the king is owner of all wealth that belongs to any person except Brāhmaṇas (abrahmaṇānām vittasya svāmī rājeti vaidikam, Mbh. XII. 77.2). This claim has been justified by learned men in the Vedas on the ground that if he cannot rightly seize others' wealth how will he practise virtue? (na ceddhartavyam anyasya katham taddharmam ārabhet, XII. 8.26.) Hence "all the wealth of the earth is the Kṣatriya's and no one else's" (dhanam hi kṣatriyasyaiva dvitīyasya na vidyate, XII. 136. 3).

Vṛhaspati claims for the king the right of transferring land in certain circumstances from one individual to

¹ Cf., the comment on 'paryādātarya' in II. 9.

another, although such steps should not be taken to override a justified title (XIX. 16 ff.). Even though royal pretension to ownership was not accepted in general it was never disputed that the king had certain transcendent authority over all land which prevented untrammelled disposal or enjoyment of land by private owners. According to Manu land given by the king could not be alienated. Nārada legislates that immovable property held for three generations is incapable of being alienated without the king's sanction. Sātavāhana kings have been seen even to abrogate their gifts substituting new ones, although these gifts tantamount only to the assignment of revenue. In the Arthaśāstra it is ordained that if disputes about fields are not settled mutually or by elders, these revert to the Crown as well as land of which ownership has been lost (*pranaṣṭasvāmikam*), *i.e.*, for which no claimant is forthcoming (III. 9). Intestate and ownerless land always went to the king (Jāt. I. 398, IV. 485, VI. 348). A vestige of royal right is also found in the Arthaśāstra rule that the king is entitled to a toll on every occasion of sale of a holding by public auction (III. 10).¹

These evidences do not bear out the theory that private property in land was held inviolable and that all pretension by the Crown to such right was denied in the clearest possible terms,² nor the supposition that the king was the owner of the soil only in the sense that he was entitled to a tithe on produce.³ It is admitted that Medhātithi explains Manu, VIII. 39 in that manner and

¹ A Faridpur Copper-plate Inscription of the 6th or 7th century assigns to the king $\frac{1}{6}$ of price according to the law in land sales (*dharmaṣadhbhāgalābhah*). See Indian Antiquary, 1910.

² K. P. Jayaswal : Modern Review, Aug., 1913. For the same view see Hindu Polity, II, pp. 174 ff.; P. N. Banerjea : Public Administration in Ancient India, p. 179.

³ Mrs. Rhys Davids : *loc. cit.*

Megasthenes, Fa-hien and Hieuen-Tsang who were impressed by the prevalence of the royalist theory readily connected with it king's right to levy specific branches of revenue from the land. But the very fiscal term *bhāga* or *rājabhāga* which denotes king's regular and legitimate share as opposed to controversial and additional imposts on land produce, would indicate a partnership of title between the peasant and the king. And there are indigenous proofs that the king's title was given a wider meaning. Else how could it persist on tax-free lands and on villages of which revenues were assigned and which assignment he retained the right to abrogate? Whether the ownership was actually divided between the cultivator and the Crown¹ (the former of course being the major partner in day to day affairs) or both were absolute legal owners on different interpretations of the law, or the king's powers were only regalian rights² is only a difference of phraseo-

¹ After examining at length the opposite views, a Mysore scholar follows the conclusion of F. W. Thomas (Camb. Hist., Vol. I, p. 475) that the king was proprietor of land in so far as he was entitled to revenue and could replace the defaulting cultivator from his holding. He adds : "In other words it was a sort of perpetual lease held on the annual performance of an obligation. For all purposes including alienation the lessee is the owner and considers himself as such, and the lessor has the right of only demanding performance of the obligation. But once the lessee fails to do his duty, the lessor's ownership asserts itself." M. H. Gopal : Mauryan Public Finance, p. 62.

Thus according to the author the basis of the land system was the same as now. In support of this deduction he has cited the authority of the Arthaśāstra where it is allowed that the king may confiscate lands from those who do not cultivate them and give to others (II. 1). But it is overlooked that the instruction is with reference to newly settled or colonised lands which undoubtedly were Crown lands. It may also be noted that although forcible collection is not rare, the eviction of free-holder and the realisation of revenue by distraint of land as exists in British India is hardly met with in ancient times whether in works of law or in more reliable records of inscriptions or popular literature. (Not so in Southern India. Hultzsch : South Indian Inscriptions, Vol III, Pl. I, No. 9.) On the other hand, as shown above, the conception of a more extended royal right is in evidence in many quarters.

² See Ghoshal : loc. cit. Strictly regalian would be only such rights as are conferred by Manu's rule that a cultivator who negligently allows his crops to be destroyed is liable to a fine of 10 or 5 times the value of the king's revenue (VIII. 243).

logy. The fact remains that the cultivator's right to his patrimony was limited, the limitation varying in degrees in different places and periods and according to different legal opinions.¹

Apart from the ill-defined and general rights of the king over all land, he had large tracts—fallow, Crown lands. cultivable or rich in natural resources—held directly under his ownership, from which he made his charitable or religious bequests.² From the Arthaśāstra's advice regarding colonisation of waste land (janapadāniveśah) it would appear that virgin and unclaimed land was king's property (II. 1). It is ordained that such reclaimed land shall be given to tax-payers only for life (karadebhyah kṛtakṣetrānyyaikapurushikāni prayacchet) or during the time they may take to prepare them for cultivation : if cultivation is neglected, such land shall be taken and given to others. Besides getting taxes, the king is to exercise his right of ownership in these lands with regard to fishing, ferrying and trading in vegetables in reservoirs or lakes (matsyaplava harītapanñānām setusu rājā svāmyam gacchet). From these lands plots the most productive may be

and by the Arthaśāstra's injunctions that the king should supersede or fine negligent cultivators and enforce the cultivation of a second crop in emergencies (V. 2), and that a tax-payer should sell or mortgage his field only to a tax-payer and the owner of a brahmadeya to another such beneficiary (III. 10). These rights are logical extensions of the royal right to land revenue.

¹ R. G. Basak (*loc. cit.*) is inclined to believe that there was a gradual advance from popular ownership of earlier days to royal ownership in later times, i.e., from about the 5th century onwards. But such a generalisation appears to be too risky in view of the discordant note of source materials and the assertion of royal claim seen as early as in the Brāhmaṇas and the Pali canon and in a more outspoken manner in the Arthaśāstra and in the Sāntiparva Mahābhārata.

² Like the king the Queen Consort and the Queen Mother also had their own estates out of which gifts or assignments of revenue could be made (Asoka, M.P.E., IV; Hatbigumpha Inscription of Khāravela's Chief Queen). Epigraphic records to this effect abound from a later time. On the occasion of Rāma's consecration 1,000 villages were assigned to Queen Kauśalyā for the maintenance of her refugees (Rām. II. 31. 22).

given to performers of sacrifices, spiritual guides, priests and those learned in the Vedas as *brahmadeya* lands exempted from taxes and fines (*adāṇḍakarāṇi*). Government officials shall also be endowed with lands which they shall have no right to alienate by sale or mortgage (*vikrayādhānavarjjam*).

The Arthaśāstra's testimony, supplemented by available sources is that the Crown lands consisted of (1) homestead and cultivated land reverting to Crown by various processes, (2) unoccupied waste, both fallow and cultivable, recovered for settlement or colonisation, (3) reserve forests, (4) mines including salt-centres which were government monopoly (*cf.* Mbh. XII. 69. 29; Karle and Nasik Cave Ins.; Pliny. XXXI. 7. 39)¹, (5) treasure trove or *nidhi*, (6) waters.

Thus the king was in absolute ownership of a large part of the soil. Of the rest he was partially the titular owner and to some extent real. Roads and parks, irrigation tanks and canals, the village pond, the mote-hall and pasture land were public property within the rural unit. Of public ownership of cultivated land evidences are more meagre but that does not rule out the possibility of its existence. The peasant freeholder enjoyed his patrimony hereditarily with rights of alienation by gift, sale or mortgage subject to an elastic royal right of interference which, however, did not go unresented when it was extended to the right of confiscation. The recipients of royal land except those of the *brahmadeya* had a still more limited title over their plot. They held land under the king's sufferance and were merely tenants-at-will. Indivi-

¹ The growth of large states and empires hastened the conversion of mines and forests into royal domains. "In the days of small states these belonged to nobody, but when these were conquered by the Magadha king all intervening territories in addition to forests and other unclaimable natural sources passed to the dominion of the conqueror."—N. C. Banerji, Economic Life and Progress in Ancient India, Vol. I, p. 288.

dual ownership was also diluted with a certain measure of communal oversight in parts where the old tribal collectivism survived. Outside these categories fell the land dedicated to the ownership of gods or temples as well as large tracts of no man's land and *terra incognita* consisting mostly of mountains and forests penetrated only by robbers, caravans and beasts and by herdsmen only in the fringe.¹

* * *

While at the advent of Buddhism, rural economy of Big and small India "was based chiefly on a system of estates. village communities of land owners,"² the primitive equality in distribution of landed wealth was gradually dissipated with the slackening of communal control and ascendancy of individual rights. From the time of Buddha and even earlier, we come across isolated large estates side by side with small decaying farms. In the *suttas*, the Brāhmaṇa Kāsibhāradvāja is found working his extensive field with 500 ploughs and a gang of hirelings (Sutn. I. 4; cf. Sn. I. 171; Jāt. II. 181). In the Suvannā-kakkata Jātaka, Bodhisatta "settled down and worked 1,000 *karīsas*³ in a district of Magadha to the north-east of the village" Sālindiyā—his native village on the east of Rājagaha (III. 293). Estates of the same measure, worked by means of bondsmen and hired labour hands, are seen in other Jātaka stories (IV. 276 f., 281). Here the landowner with a wealth of 800 millions is a familiar figure (asitikotivibhavo kuṭumbiko, IV. 370, etc.), typical of whom is Sujāta of Benares, who lodges in his park and ministers to 500 ascetics (V. 465). Such big plot-holders are also

¹ The Aithasāstra indicates that pastures, plains and forests (*vivitamālavana*) are not subject to individual ownership (III. 10). According to Uṣanas places of pilgrimage were also nobody's property along with hills and forests (V. 16).

² Mrs. Rhys Davids : *loc. cit.*

³ According to Childers' Pali Dictionary, S. V. *ammanam* a *karīsa* would be about 8 acres.

termed *gahapati* in Pāli literature, literally the *pater familias*, sometimes only a substitute for the generic *Vaiśya* but actually indicating the agricultural magnates as the *setthi* conveyed the industrial magnate.¹ The Brāhmaṇa *gahapati* frequently appears in the Jātakas as owner of property worth 800 millions. It would perhaps be no wild presumption that the gifts of *brahmadeya* or rent-free land imposed by priesthood on temporal authority with cajoles and threats (Āpast. II. 10. 26. 1; Manu, VII. 83 ff.; Yāj. I. 314; Mbh. XII. 343. 18; XIII. 62), sometimes deviated from the avowed purpose of maintaining an order dedicated to religious service (Dn. XII. i. 1; Mn. 95) and conducted to the concentration of land in the hands of secular Brāhmaṇas who are so prominent by their landed wealth in folk literature although in didactic pieces cultivation of land is assigned exclusively to *Vaiśyas*.

Side by side with the *gahapati* or *kuṭumbika* or the
Agricultural indebted- *Vaiśya* according to Sanskrit nomencla-
ness. ture is observed the toiling cultivator

struggling against starvation, managing his plot single-handed or with his sons only (Jāt. I. 277, II. 165, III. 162, IV. 167, VI. 364; Rām. II. 32 30; Mbh. XII. 177. 5 ff.; Jacobi: J.S. II. 347). The Gāmanicanda Jātaka offers (II. 300) the case of a tiller who had to run the plough by borrowing a neighbour's team of oxen. This petty cultivator is indicated by the word *kināsa* in Sanskrit works as counterpart to the big *Vaiśya* or *kuṭumbī*. The Jātaka evidences throw some light on an important aspect of the relation between these two divergent types of farmers. A *kuṭumbika* is often seen to make a journey on cart to distant villages for collecting debts, sometimes accompanied by his wife (II. 341, III. 107, IV. 45). In one case he is seen attaching a cart of a defaulter

¹ Of course agricultural and industrial pursuits were very often combined by these lords and a *setthi-gahapati* like Anāthapindika is no rarity.

in satisfaction for what was due to him (III. 66). It appears that the big farmer carried on a lucrative money-lending business in villages not always without abuse. It is of course the small farmer who ran into debt in times of scarcity and sometimes losing his plot whether under extortion or from want turned a destitute vagrant and offered himself for hire in the rich man's estate.¹

But whatever might be the inequality of landed property between the different classes of peasants it did not foster the isolationist mentality and the deplo-
 Safeguard of big and
 small estates : no pri-
 vileges based on land.
 rable nemesis of agriculture as we see in
 the present day. No stigma was attached to labour. The Indian yeomanry put their hand to the plough along with their men as much as their less fortunate brethren. They were not attracted by the luxuries of the town to leave their prosperous farms to go to ruins under the care of indifferent subordinates. The small farmer as well was never squeezed out of existence under the remorseless pressure of a superior economic caste standing in haughty segregation. Nor did large estates carry with them any political or social privileges except those naturally conferred by wealth. "There was among Indo-Aryans little of the feudal tie between land and lord with lordship over the land-tillers which made broad acres a basis for nobility in the West."² It is for this reason that landed wealth in ancient India never developed into the exorbitant power and influence of the Roman patriciate, the French baronage and the Moslem Jaigirdar. Legally the big landowner and the small husbandman stood on an equal footing and, over each at the top, the king retained a residual power which was both legal and real.

¹ See *infra*, Bk. VI, Ch. II. Cf., the plea of C. V. Vaidya on the effects of widespread usury upon the ryot class. *Epic India*, p. 219.

² Mrs. Rhys Davids: *loc. cit.*

CHAPTER III

THE VILLAGE LORD

The *Gāmabhojaka*. Recipient of revenue; absentee lord. Origin and evolution; benefits without responsibility. Perquisites. Judicial function. Powers. Democratic representative or bureaucratic agent? Transition from popular headship to leisurely landlordism or official hierarchy.

Between the king and the peasant there intervened in Indian land system a powerful class of intermediaries somewhat analogous to, but far from identical with the modern landlords. The Jātakas contain meaningful references on the duties and powers of the *gāmabhojaka* who played a most important part in India's rural economy. Other Pali works and the Arthaśāstra mention *en passim* the *gāmabhojaka*, the *gāmika* and the *gāmaṇi* presumably referring to the same figure. These few but weighty remarks, pieced together, lead to certain broad probabilities which ill accord with the theory given currency in many quarters that he was a typical product of the free institutions and corporate life of the ancient village system.

The village lord was not the owner of the soil and in this respect differs from the Zemindar. He was authorised to enjoy the revenues to which the king was entitled and which accordingly he could delegate to any person of his choice; and this delegation was accompanied with necessary powers. The lord was neither an administrative official of the village nor a communal head. He frequently appears in the rôle of an absentee lord who dwells in a town not necessarily in

Recipient of revenue :
absentee lord.

close proximity and periodically visits his *bhogagāma*.¹ In the *paccupannavatthus* of the Jātakas Anāthapiṇḍika often goes to supervise the affairs of his village leaving his house at Sāvatthi (I. 365, 412, 441). Sometimes the absentee lord is pre-occupied with mercantile pursuits and the village is an additional source of income possibly unearned, where he goes only to realise his dues and debts traversing a long journey on cart (I. 413, V. 164).

Development of the
institution : revenues
without administrative
functions.

Wherfrom were these ownerships derived and what was the process of their evolution ? The earliest trace of this type of landlord villages is found in the Taittirīya Samhitā where it is told in connection with the performance of certain sacrifices by a person hankering for a village (*grāmakāma*) how the gods concerned 'bestow him creatures led by the noses' (II. 1. 1. 2), how they 'present his relations to him and make the folk dependent on him' (II. 1. 3. 2) and how they enable him to hold the mind of his peers (II. 3. 9. 2). These cryptic expressions mean if anything that the village lordships were acquired in the first instance by individual exertion and afterwards received the seal of royal confirmation. The Jātakas belie throughout the tradition embodied in the Satapathī Brāhmaṇa (XIII. 7. 15) and recalled in the Mahābhārata (XIII. 154.1 ff.) that land must not be given away even on the plea of a sacrificial fee. In the Epics the earth no longer reprimands kings for her transfer and even wants to go over to Brāhmaṇas. In the Jātaka tales recipients of royal bounties

¹ The rendering of *bhogagāma* as Zemindary as followed in Cowell's translation of the Jātakas is misleading. There is a gulf of difference between the modern and mediaeval zemindary estates and the villages assigned for *bhoga* or *bhojana* apart from the fundamental point of proprietorship, as shown at the beginning of the next chapter. Nor is the word 'headman' an apt substitute for '*bhojaka*'. The *patel* and *lambadar* are as distant from the *bhojaka* as is the zemindar, judged by their respective functions and capacities.

are not always Brāhmaṇas and the donations of villages are almost invariably accompanied by the conventional phrase "yielding a hundred thousand a year" (sata-sahassutthānaka, I. 420, II. 403, III. 229, V. 350, 371). In the Mahāummagga Jātaka, Mahosadha on his way from Uttarapañcāla to Vedeha sends men to receive the revenue of the eighty Kāsi villages which king Cūlañī had given him (VI. 463). The grantee in this and similar occasions when he is a town-dweller appears to be out of touch with village administration except so far as is necessary for collection of revenue. It is likely that he obtained not the administration¹ but the revenues of the village, *i.e.*, benefits without responsibility; and as the big money-lender he may have asserted his furtive power still further in his rural preserves not always with happy results. Instances of pious men like Anāthapindika are fortuitous and there is little reason to believe that his charitable acts were dictated by any customary obligation implicit in ownership.

¹ In the Dīgha and Majjhima nikāyas there is a stock passage which seems to indicate *prima facie* that the royal grants to the *mahākālas* carried with them administrative power. "Now at that time so and so the Brāhmaṇa was dwelling at such and such place, a place teeming with life with much grassland and woodland and water and corn (sattussadamp satinakatthodakamp sadbhāñnam), on a royal domain granted him by so and so the king as a royal gift with power over it as if he were the king" (*rājabhoggam rāññā dinnamp rājadāyamp brahmadeyyam*, Dn. III. i. 1, IV. i. 1, XII. i. 1, XXIII. 1; Mn. 95). The 'fief' (?) from the description seems to be not a settled village but a large tract of irrigated and cultivated soil with adjoining fen-land and pasture fit for animal farming; and if Buddhaghosa's alternative explanation of 'rājabhoggam' as 'what is for king's enjoyment' is accepted, the concluding phrase permits the interpretation that the usufructuary right and titular ownership of the king were transferred to the assignee along with the land. The analogy between Lohicca's domain at Sālavatikā and Pasenadi's kingdom of Kāsi and Kosala is drawn upon the usufructuary right and ownership which are common to both. The story of the Majjhima 95 in no way indicates that Canki was master of the village of Opasāda and its Brāhmaṇa community, but that he was only the owner of a large plot of land. The testimony of the Arthaśāstra as well implies that *brahma-deya* gifts were gifts of rent-free lands and not of villages carrying for the donees revenues alone; and there is no ground to associate political and administrative responsibility with these lands.

The village lord is not necessarily—nay he is rarely—
 Perquisites. the mainspring of the *gāma*'s corporate life
 and collectivist enterprise. In this respect
 he differs from the *jetṭhakas* of the industrial *gāmas* or of
 the trade-guilds. In the *Kulāvaka Jātaka* Bodhisatta is the
 moving spirit of the sturdy *gāma* life and the *bhojaka* is put
 to the thought “when these men used to get drunk and
 commit murder and so forth, I used to make a lot of money
 out of them not only in the price of their drinks but also
 in the fines and dues they paid” (aham pubbe etesu suram
 pivantesu paṇātipātādīni karontesu cāṭikahāpāṇa divasena
 c'eva dandabalivasena ca dhanam labhāmi); and he brought
 a complaint to the king on false charges against Bodhisatta
 and his flock (I. 199 ff.).

These few words read with the allusion to a pious lord
 in another place who stopped the sale of strong drink in his
 estate (IV. 115) lead to a presumption that the *bhojaka*
 either himself maintained breweries in the village, those
 crime-centres and plague-spots of rural life, or he enjoyed
 the excise dues thereon whether within or outside the

The lord's justice. revenue transferred by royal assignment.

The fines undoubtedly went to his pocket.
 For he adjudicated rural cases. He is seen to try a dispute
 and fine a fisherman's wife and then to tie her up and to
 beat her to realise the fine (I. 483). To a question why
 a certain *bhojaka* had fallen from better days a king replies :
 “That village lord used once to deal justice even-handedly,
 so that men were pleased and delighted with him; and in
 their delight they gave him many presents (bahupaññākāram
 āharimsu). This is what made him handsome, rich and
 honoured. Now he loves to take bribes (lañcavittako hutvā),
 and his judgment is not fair; so he is poor, miserable and
 jaundiced. If he judges once again with righteousness
 he will be again as he was before. He knows not that
 there are kings in the land. Tell him that he must use

justice in giving judgment (*dhammena attam vinicchinitum*, II. 309).

A sharp demarcation between the legitimate dues and the illegal gratifications of the *bhojaka*. But a judge who can accept presents from litigants without any sense of wrong must be prone to count these tips among his dues as much as the judicial fines and to allow his decisions to be bought all the more when these are not assisted by a jury or a folk-moot of any sort¹ and when there appears to have been no appeal against them. The vaunted prerogative of interference claimed by the king was certainly no common occurrence in those days of disorder and insecurity, of decentralised government and undeveloped communication.² It was asserted only on grave issues or when the king's revenue was at stake. Else it would be prudent to let the sleeping dogs lie.

¹ The village affairs discussed in the public hall bore on civic amenities, co-operative labour, state of crops, etc., but probably they did not as often include judicial matters except perhaps in the republics and a few villages. It may be admitted that in some self-governing villages the assemblies had a parallel jurisdiction although it is difficult to be limited from the *bhojaka*'s (see *infra*, p. 54). In the foregoing passages the *bhojaka*'s justice is undivided. The Arthaśāstra ordinance of a fine of 24 *papas* for a *bhojaka* who expels from a village anyone except a thief and an adulterer (III. 10) presumes untrammelled exercise of his judicial powers. There is no sufficient data for the assumption that in Maurya times he carried on the village administration and judicial business in consultation with the *grāmavṛddhas* or elders. For this view see Thomas : Camb Hist., Vol. I; Raychaudhuri : Political History of Ancient India, 4th. Ed., pp. 239 f.

² The evidences of the Kūlavaka Jātaka and of the Gāmanī-canda Jātaka just quoted, leads a scholar to think that "administration of justice was one of the essential links that bound the scattered villages to the central organisation of the state" and that in this matter final authority rested with the king. He relies further on the custom referred to in the latter by which anyone could challenge a disputant to come to the king's officer by picking up a potsherd or stone. But the village concerned is not a *bhogagāma*. Such central control in normal administration of justice in rural areas under influential lords goes against the cumulative evidence of the Jātakas and the possibilities of the times. See B. C. Sen : Journal of the Department of Letters. C. U., Vol. XX, p. 107.

Without doubt the *gāmabhojaka* was a big man of opulence and position whose wrongs could not be held in check by any lesser authority than the Powers king. He (*gāmasāmiko*) could assemble all the villagers by an order at a short notice (*sabbe sannupatantūti*) by means of a crier (*āñāpako*, Mil. 147). In the *Kulāvaka Jātaka* referred to above, we find him for once heavily chastised by the king for falsely bringing grave charges of treason against the whole body of villagers. He has power to prohibit slaughter of animals for sacrifice within his area (IV. 115). He dares to commit adultery with a *gahapati*'s wife and when caught and thrashed by the husband, none other than Bodhisatta would have ventured on such short methods of exacting 'damages,' expostulates saying that he is the village lord (II. 135). He is a greedy fellow always after the belongings of his neighbours (Sn. I. 60). Elsewhere he conspires with brigands to carry off the taxes collected for the king: and here for the second time we see him feel the heavy hand of an overlord (I. 354).

The last instance furnishes a valuable clue to the clarification of the *bhojaka*'s position. Here he is designated as an *amacca* or official appointed by the king and entrusted with the collection of his revenue from certain villages. Then how is he a *gāmabhojaka* or devourer of village revenues? The most probable answer is that he is the *bhojaka* of a village which is given by the king for his enjoyment as remuneration for his office. This is in agreement with the injunctions of the *Arthaśāstra*, of Manu and of the *Mahābhārata*. In the first, grants of land to king's officers without the right of transfer form part of the revenue administration (II. 1) while the other two lay it down that the lord of 10 villages is to be remunerated with 1 *kula* of land (land cultivable with 12 oxen) of 20 villages with 5 *kulas*, of 100 villages with a village and of 1,000 villages

Democratic representative or bureaucratic agent?

with a townlet (*sākhānagara*) (Manu, VII. 119; Mbh. XII. 87.6-9). The strength of a solitary evidence may not suffice to allow the conclusion that the *gāmabhojaka* of the Jātaka stories bore this uniform character. The position of the royal chaplain (*purohita*) and of the high treasurer (*mahāseṭṭhi*) like Anāthapiṇḍika, whom we often find in enjoyment of *bhogagāmas* (III. 105; IV. 473, 484; VI. 463) was undoubtedly analogous. As for other cases, whether he was king's nominee or elected by the rural constituency or whether he held a hereditary post it is impossible to ascertain beyond dispute. While the Jātakas and the Pali canon bear no trace of hereditary landlordship in later inscriptions lands and villages are often made over as hereditary bequests. In the Mahāsutasoma Jātaka "lordship of a single village" (*ekagāmabhojanam*) is spoken of in contrast with the "office of commander-in-chief and similar posts" (*senāpatitṭhānādīni*, V. 484), the suggestion being that the lord was a king's officer. There is no example in the birth-stories or any contemporary evidence to warrant the conclusion that he was the "elected chief of the village community."¹ That he stood in certain relations with the king is attested by many passages (IV. 310). The *gāmani* is much concerned with the king's favour or disfavour (IV. 310). In the Cullavagga the *gāmani* Maṇicūlaka is in close touch with

¹ For this view see Fick : Die Soziale Gliederung im Nordöstlichen Indien zu Buddhas Ziet, pp. 105 f.; cf. Rhys Davids, "There were no landlords. And the great mass of the people were well-to-do peasantry, or handicraftsmen with land of their own, both classes ruled over by local headmen of their own selection" (Buddhist India, p. 102). In the case of the latter there are positive evidences that the position of the *gāmajetṭhaka* in industrial villages was hereditary (*infra*, Book II. Ch. V). A. S. Altekar draws attention to a Mathurā Inscription of the first century A.D. (Ep. In. I. 11) where a lady is mentioned as wife and daughter-in-law of two *grāmikas*,—a fact possible only when the office is hereditary. While the succession of a son on the retirement of an incumbent is in no way extraordinary, this solitary instance cannot be accepted as pointing to a general rule. The Jātakas nowhere testify to the "hereditary office" propounded by the author. See A History of Village Communities in Western India, p. XIV.

royal attendants in the Chamber (XII. 1.4. An ; IV. p. 326). As noticed above he could seek justice in king's court whenever there was trouble in his affairs. It is probable that he discharged certain vague undefined functions as an intermediary between the king and the freeholders.

Thus the village lord is *persona grata* with the king as with the villagers. He is apparently the sole and final judge of the small village causes when domiciled within his locality. The king's revenue is assigned to him by royal writ. The judicial fees and fines and the returns of liquor houses or excise dues are among his perquisites to which bribes and presents form a lucrative addition. He is the agricultural bank *par excellence*. He may have had other incomes lawful or otherwise,¹ for his assets are in cases assessed at 800 millions. In one of these he is the king's chaplain and hoards up the sum apart from his office (*purohitāthānena saddhim asitikoṭidhanam chaddetvā*, (IV. 484), presumably from the *bhogagāma* which he visits from time to time (IV. 473). The multimillionaire *Anāthapindika* too often beats the record and regales in his park thousands of ascetics. Given due allowance for the tendency of folktales towards exaggeration, these figures show that the village lord might occasionally rise to the topmost rung of the economic ladder and constitute a plutocracy with the *Brahmana* and *setthi* magnets who basked in the sunshine of court and whose wealth is often estimated in the same fabulous figures.

Whether absorbed in the luxuries and money transactions of urban life or settled in his rural preserve, the lord has little to do with the communal life of the village and he owes no responsibility either to the king or to a village

¹ The terms 'gāmabhojana' and 'bhogagāma' suggest not usufructuary title over land to the exclusion of cultivators but enjoyment of all possible revenue derivable from the village. Cf. "Those (articles) which the villagers ought to furnish daily to the king, such as food, drink and fuel, the lord of one village shall obtain". Manu, VII. 118.

council for rural welfare. In the numerous famine scenes we invariably miss him. Once only he is found giving an old ox to hungry cultivators under the grip of scarcity on condition of repayment after two months from the next harvest (II. 135) and this must be regarded as part of his ordinary lending business than of a benevolent distribution of dole.¹

In the Vedic texts village headmen (*grāmaṇi*, *grāmika*) are styled *Rājakartr̄* and *Ratnīn* aiding in the consecration

Transformation of the
people's man to an
official or a leisured
grandee.

of the king among certain other functionaries and are consulted by the king along with his ministers. The *Mahāvagga*

gives the important reference that the *gāmikas* of Bimbisāra 80,000 in number, used to be summoned in a great assembly (V. 1.3.). In those days when kingship had not yet outgrown the tribal stage, the village chiefs were communal representatives and exerted a wholesome check on royal absolutism. But later records which synchronise with the growth of a centralised monarchy fortified by a bureaucratic machine, strike a different note. The periodical assemblies of *gāmikas* seem to have fallen into disuse with the rise of Maurya imperialism : they gradually sank down from the headship of autonomous villages to sleeping lords with irresponsible powers and vested privileges or were transformed into king's officers and absorbed into an official hierarchy. The *Jātaka* stories exhibit them in both these colours. Even as early as in the *Upaniṣads* the king is found appointing *adhikṛtas* over *grāmas* (Praśna-Up. III. 4); such appointment tallies with

¹ The *Arthaśāstra* exhorts villagers to accompany the *grāmika* by turns whenever he " has to travel on account of any business of the village " (*grāmārthena grāmikam vṛajantam upavāsāḥ paryāyenā 'nugaccheyuḥ*, III. 10). Nothing can be inferred either way from this vague statement. From evidences already adduced it may be argued *a fortiori* that this business was personal (*i.e.*, related to his own income) rather than corporate and administrative.

the conception of civil polity and paramount sovereignty implied in the honorific *Samrāṭ*. The *gāmikas* of Bimbisāra, be they elected or nominated, took orders and instructions from a controlling monarch (*dīṭhadhammike* at the *anusāsitā*). In the *Arthaśāstra* the *grāmikas* are subordinates to the *gopas*, *sthānikas* and still higher officers. The bureaucratic system is perfected in the law-codes (*Āpast.* II. 26.4.5; *Viṣ.* III. 7-15; *Yāj.* I. 337) and Manu lays down a detailed official gradation. The *grāmikas* appointed by the king are not to take cognizance of crimes and decide according to their free will but report all cases to lords of ten villages, they in turn to the next superior officers and so on (VII. 115-117; *Mbh.* XII. 87. 3 f.). In the Śukranīti-sāra the chief is a king's deputy (II. 343) intoxicated by drinking the vanity of office (II. 227). In the Saka and Gupta inscriptions as well, side by side with prolific land charters issued to royal favourites without any corresponding service derived in return, the *grāmikas*, *bhojakas*, etc., are found fitted into an elaborate framework of civil administration. Thus the upholder of popular rights and duties who loomed large in Vedic and early Buddhist social economy is no longer the bulwark of free village corporations and fades out into a leisurely lord or is stereotyped into an official automaton.

CHAPTER IV

ASSOCIATE LIFE IN THE *Gāma*

The soul of village life. Public works, the *sāla*, collective charity, educational endowments, religious bequests, economic co-operation. Industrial villages. Communal amusement—the *samāja*. Evolution from tribal autonomy to the concept of corporation and democracy.

Taking into consideration his powers and functions from every point of view, the advent of the *bhojaka* whether as an official or as a non-official cannot be held to have been a welcome feature in India's village economy.¹ But she was spared the baneful conclusion of the feudal order—exaltation of landlords into a parasitic nobility and reduction of peasants into serfdom. The *bhojaka* had no proprietary rights over land, no seigniorial rights conferred with royal deeds, the so-called rights of confiscation, eviction, escheat, etc., or of arbitrary levies like the *salāmī*, *ābwāb*, *bhet*, *begār* or the *bovine*, *banalité*, *péage*, *gabelle*, monopoly of the dove-cote and so on.¹ The peasantry lost none of their rights on their freehold under a royal charter: they only gave the tithe due to the king to another man. Nor were perhaps their estates liable to summary sale or attachment for arrears of revenue. The periodical oppression and illegal exactions which they had to bear with could not reach the inner spring of rural life and sap its vitality. It lay deeper in the healthy spirit fostered by the tribal community, of discipline, fellowship, liberty and public conscience

¹ Inscriptions show that the immunities of royal assignments were much extended in later time.

among the villagers which outlived the chequered career of monarchical despotism and bureaucratic imperialism.

The working of the communal ideal which kept the ^{Public works} countryside pulsating with the exuberance of life is seen in Vedic literature embedded in the tribal feeling of the clan or *viś*. The Jātakas, the earlier Smṛtis and the Arthaśāstra reflect the further stage of its growth and interesting characteristics. It seems that the sweeping influence of Buddhism with its principles of liberty and equality gave a powerful impetus to the ideal of communal harmony and co-operation. The graphic and elaborate details of the Kulāvaka Jātaka are more than a utopia of priestly doctrinairism. The scene is a Magadha village of 300 families or *kulas* :—

“One day the men were standing in the middle of the village transacting its business. They too doing good works along with him (Bodhisatta), used to get up early and emerge with razors, axes and clubs in their hand. With their clubs they rolled out of their way all stones lying on the four highways and other roads of the village; they cut down the trees that would strike against the axles of cars; they smoothed the rough places, built causeways, dug water-tanks, built a hall; they showed charity and kept the Commandments.”

“Te ca timsa kulamanussā ekadivasam gāmamajjhē thatvā gāmakammā karonti.—Te pi ten’eva saddhim puññāni karontā kāless’eva vutṭhāya vāsipharasumusalahatthā catumahāpathādīsu musalena pāsāne ubba:tetvā pavattenti yānānam akkhapatīghātarukkhe haranti visamam samam karonti setum attharanti pokharaniyo khananti sālam karonti dānāni denti sīlam rakkanti ” (I. 199).

This observance of moral law and civic duties discharged under communal guidance and discipline are the vaunted spell, safeguard and strength of the villagers, —*manto ca parittañ ca vaddhin cāti* (200).

They are given by the king the village, the elephant and the *bhojaka* as slave for reward. Then they built a large hall at the meeting of the four highways. Even women are very keen to participate in this corporate enterprise.

"They had benches put up and jars of water set inside, providing also a constant supply of boiled rice. Round the hall they built a wall with a gate, strewing the space inside the wall with sand and planting a row of fan-palms outside."

"āsanaphalakāni santharitvā pāniyacātiyo ṭhapetvā yagubhattam nibandhimṣu sālam pākārena parikkhipitvā dvāram yojetvā anto pākāre vālukam āharitvā bahi pākāre tālapantim ropesum."¹ (201).

The hall was completed with the construction of a flower and fruit garden and a lotus-pond.

The Mahāummagga Jātaka hints at the manifold purpose served by the public hall or *sāla*, the throbbing heart centre of the village organism. Bodhisatta as a boy collects subscriptions from the playmates and gets a hall built in the eastern suburbs (*pācinayavamajjhaka*—later referred to as a *gāma*) of Mithilā with special apartments for ordinary strangers, destitute men, destitute women, stranger Buddhist monks and Brāhmaṇas, foreign merchants with their wives, all these with doors opening outside (*vahimukhāni*). A public place for sports (*kīlamandalam*), a court of justice (*vinicchayam*), a convocation hall (*dhammasabham*); beautiful pictures, "a tank with 1,000 bends in the bank and 100 bathing ghats" (*sahassavamkñm satatittham pokharan̄im*) covered by lotuses and bounded by a park, and an almshouse (*dānabhāttam*) gave completion to the building scheme (VI. 333).

¹ Cf. the rest-house of Pātaligāma where the *upāsakas* invited Buddha and his fraternity and strewed its floor with sand, placed seats in it, set up a waterpot and fixed an oil lamp (āvasathāgaramp santharitvā āsanāni paññapetvā udakamāṇikampatiṭṭhapetvā teśapadipam āropetvā, Mv. VI. 28.2; Ud. VIII. 6.)

This is only the execution of the corporate rural ideal in a larger and perfected scale. The village *sāla* is thus a shelter for the stranded, an asylum for foreign visitors, an inn for travellers.¹ For the villagers themselves, it is the centre for recreation, administrative affairs and religious discussion. Last but not least, here is organised the collective charity.

For this specific purpose the villagers and townsfolk are often seen to combine. According to the *paccuppanna-vatthu* of the Susīma Jātaka, the people of Sāvatthi were used to practise charity by isolated families, or by grouping together into associations (*ganabandhanena vahu ekato hutvā*) or by clubbing together into streets (*vīthisabhāgena*) or by collection of subscriptions from among all the citizens (*sakalanagara-vāsino chandakam samharitvā*, II. 45). The Kalpadruma Avadāna attests how the magnets of Sāvatthi gave a united front against the incursion of famine on their less fortunate brethren. The people of Rājagaha followed suit and used to combine for purpose of almsgiving. The subscriptions were raised in money or in kind. Here as in Sāvatthi, apparently this was the general custom in all self-governing areas, on any dispute a division was called and the voice of the majority prevailed (II. 196). Probably this was an imitation of the *yebhuyyasikā* or decision by majority vote as laid down by Buddha in the Vinaya Piṭaka (Cv. IV. 9, 14. 24) on the procedure of the assembly of the Samgha.

Analogous to the charitable works were the educational establishments maintained by the individual or collective aid of the people. The Losaka Jātaka narrates that Bodhisatta ran an academy of 500 poor Brāhmaṇas at Benares and the

¹ Cf. the *āvasathāgāra* or village rest-house in Mv. VI. 28.2. and Dn. XVI. i. 20. Here rice-meal is supplied to travellers.—Vin. pātimokkha, pācittiya, 31. These 'charities' were not less frequently built by private munificence.

townsfolk supplied meals to poor lads and had them taught free (tadā bārāṇasīvāsino duggatānam paribbayam datvā sippam sikkhāpenti). The villagers offer a miniature replica of the municipal institution: for Mittavindaka is paid by the residents of a *paccantagāma* to teach them what was true doctrine and what was false (presumably on the strength of his reference as a pupil of Bodhisatta) and given a hut to live in at the entrance of the village (gāmavāsino 'ambākam susāsanam dussāsanam āroceyyāsīti 'mittavinda-kassa bhatim datvā tam gāmadvāre kuṭikāya vasāpesum). But Mittavindaka's evil star brought the king's wrath on the village and the villagers after holding a conference drove him out with blows (I. 239). Very similarly another group of villagers paid a logician (*takka-paṇḍita*), and settled him at village entrance in a hut to teach them lucky and unlucky seasons (suyuttam duyuttam, I. 296). In other places villagers give their quota in the form of eatables for the upkeep of a sylvan school in the vicinity (III. 537) or for the maintenance of a learned preceptor (II. 72). Individual villagers (IV. 391) or houses or *kulas* (I. 318) sometimes treated teachers and students in banquets.

Closely akin to the charitable and educational works, the religious bequests were another channel in which the associate enterprise of villagers found vent and expression. In one case we see them putting off under one pretext or another the construction of a cell for a Brother who had paid for it (I. 215). But inscriptions on the votive offerings of the Sānchi Topes (which are placed in the 3rd century B.C.) are living illustrations of this side of village activity. Here we have—

Vejajasa gāmasa dānam (Tope I, No 17)
Padukulikāya gāmasa dānam (II. 1)

Asvavatiya gāmasa dānam (I.215)
 Chunivamoragiri gāmasa dānam (II. 49)
 Nāsikakanam Dambhikagāmasa dānam
 (Nasik Cave In. 20. VI)¹

rendered by Senart as 'gift of the village of Dambhika of the Nasik people' and by Bhagwanlal Indraji as 'gift of a village by inhabitants of Nasik.'

Gifts were also made from among restricted associations, committees (*goṣṭhi*) or families (*kula*):

Gift of the Bauddha *goṣṭhi* from Dhāmavadhanana (I. 25,26)
 „ „ Barulamisa *goṣṭhi* „ Vedisa (I. 51)
 „ „ Vākiliyas „ Ujjein (27)
 „ „ Kula of Dhamutara (I.276)
 „ „ sons of Disāgiri from Puruvida (I. 290)
 „ „ —Subhagā, Pusā, Nāgadata, Sagharakhita, inhabitants of Kuraghara (I.375).¹

That the villagers did not content themselves by merely making over endowments and setting up temples is proved by the significant institution of the *goṣṭhi* which is explained by Bühler as a Committee of trustees in charge of a temple or of charitable institutions. Here the people sent their representatives to manage their endowments and guide their religious observances.²

The entertainment of Buddha with his Fraternity by the faithful which became a general custom in the Gangetic provinces was performed sometimes by individuals, sometimes by families, sometimes by *gāmas* and even whole clans. A single family might make a house to house collection of food materials (Jāt. II. 85, Mv. VI. 37) or all the villagers might come forward (*ibid.*, 28.2; 33.1). The Mallas of Kusināra even make

¹ For further instances of this nature see Amarāvati inscriptions, E. I. XV. 13. Also Bāhut,—Kārahakaṭa nigamasa dānam.

² Bhattiprolu Inscriptions.

compacts that whoever does not join the reception shall be fined and that the members should regale the Samgha by rotation (*ibid.*, 36). Sometimes it was the turn of a section or assembly (*pūga*, Cv. V. 6.2; 26; VIII. 4.1). The corporate unity and homogeneity of faith among the villagers facilitated the conversion of villages *en masse* by Buddha repeatedly claimed in the Pali canon.

The villagers were closely knit together by economic bonds of diverse sorts. They maintained a common ~~Economic co-operation.~~ neatherd to take charge of and graze their cattle in the adjoining pasture or forest (*Jāt.* I. 194, III. 149; *An.* I. 205; *Rv.* X. 19) on pay¹ or on a share of the dairy produce which was standardised by specialists at 1/10 (*Arth.* III. 13; *Nār.* VI. 2-3; *Yāj.* II. 194). Traces of collective farming are not wanting and it would not be extravagant to conjecture that the *gāmakhetta* in which the several plots were demarcated by irrigation canals, was cultivated under collectivist initiative (*Vṛ.* XIV. 25, *Arth.* II. 10; *Jāt.* II. 109). The casual reference in the *Jātakas* to the ploughing festival (*vappamamgala*, IV. 167, VI. 479), a great annual ceremony when the King held the plough along with the peasants,² conjures up a cheerful associate life and a full realisation of the community of agricultural interests. That the village formed a compact self-centred unit is indicated by the *Smṛti* emphasis on village boundary and the frequent Pali reference to the village gate (*gāmadvāra*, Cv. V. 24. 1; *Jāt.* I. 239, V. 441; *Mil.* P. 365, etc.). The kings recognised the economic entity of a village and treated it as such. *Vāśiṣṭha* characterises it as corporate unity and speaks of collective fine imposed on it (III. 4). The *Jātakas* have many allusions to kings raising the tax of a

¹ This, according to *Nārada*, is a heifer annually for tending 100 cows, a milch cow for 200 and the right to milk all the cows every 8th day (VI. 10).

² See S. Hardy : *Manual of Buddhism*, p. 150.

village or exacting fines from it as a whole (I. 234, 239; III. 9).

In the Mahā-assāroha Jātaka as in the Kulāvaka Jātaka, the 30 inhabitants of a *paccantagāma*, *Gāmakiccam*. here in Kāsi, “gathered together very early in the middle of the village to transact its business” (te pāto va gāmamajjhe sannipatitvā gāmakiccam karonti, III. 8). When the village tax was increased the man who was the cause of the trouble was jointly induced by the villagers to go and see the unknown horseman and they provided him with the presents (*pappnākāram*) he required for the visit.

The quotations amply clarify what were the *gāmakam-mam* or *gāmakiccam* to deliberate over which all the villagers assembled in the central hall. These comprised judicial functions,¹ municipal work like irrigation, roadmaking, etc.; humanitarian and charitable activities subsidising academic foundations; sacrificial performances, pious invitations and religious endowments with the formation of boards of trustees; examining the state of crops and incidents of general interest. Rural problems loomed large and from here started the ‘marches’ and deputations to the *bhojakas* or higher authorities urging relief against famine (Jāt. II. 135, 367; V. 193; VI. 487), beasts, robbers (Jāt. V. 459), *yakkhas* (Jāt. V. 22) and similar pests. Sometimes grave decisions were reached in this

¹ This is conjectural. The *sabhā*, *parisa*, *rājakula* and *pūga* are given as assemblies which examine witnesses (Mn. 41, 141). Later Smṛtis (Yā. Nār. Vṛ.), subsitute *gana*, *śrenī*, and *kula* for the first three. The *sabhā* and the *gana* fit in with the village assembly. There is also the express reference that a Brāhmaṇa must not take the food offered by those who are punished by a *gana* or a village (*ganagrāmābhiseṣṭanām*, Mbh.: XII. 37 30). In the Jātakas we have the solitary reference to the *vinicchayam* (VI. 333) as part of the *sāla*, whereas the *bhojaka* appears as the habitual judge of village causes enjoying fees and fines. He is more an official than a popular personality and has little association with the democratic rural apparatus (see *Supra*, pp. 43 ff.). Did the *bhojaka* hold the pleas of the crown and the village *sabhā* meet only to enforce common law and corporate obligations under the sanction of social ostracism?

village council which infuriated peaceful masses into bloody revolt to pull down the instruments of autocracy and tyranny which infringed their traditional rights and interests sanctified as common law.¹

The industrial and professional *gāmas* of the Jātakas exhibit a closer bond and homogeneity than the agricultural *gāmas*. We have a fishing village of 1,000 families (*kulasahassavāse kevattagāma*) in Kosola of which the 1,000 fishermen used to go out in a body with their nets (I. 234). In the kingdom of Kāsi, a smith's village of 1,000 houses (*kammāragāma*) was organised under a head (*jetthaka*, III. 281). Near Benares on the two sides of the Ganges were two villages of hunters (*nesādagāma*) with 500 families in each and each organised under a chief (VI. 71). Benares also offers the example of a village of carpenters (*vaddhakigāma*) with 500 members who organised into a body under a head, plied their trade and received wages together and led a common livelihood (I. 18).² Similar references there are to villages of salt-makers (*lonakāra*, Mn. 128, Jāt. III. 489), basket-makers (*nałakāra*, Mn. 99), robbers (*cora*, Jāt. I. 297, IV. 430), actors (*naṭa*,—see Bühler's note in E.I. I. 43), caravan-guards, Brāhmaṇas, *candālas* and outcasts. This isolation

¹ Instances of popular revolt against misrule are not wanting in the Brāhmaṇas and the Jātakas where they sometimes expel or even execute their princes together with unpopular officials. The fear is portent in the Arthśāstra (VI. 1), Manu (VII. 111) and Sukranīti (IV. 7 888-89) all of which issue solemn warnings to the king against this grave retribution of tyranny. In the Anuśāsana-parva, Mahābhārata, armed revolt against and deposition of unprotecting sovereigns is definitely enjoined upon subjects (61. 32 f.). The Ceylonese chronicles state that the kings of Magadha from Aśāśatru to Nāgadāsaka being all varicides the people banished the dynasty and raised the *anātya Śusumāga* to the throne. The people of Taxila revolted against Aśoka for official maladministration who sent prince Kunāla to restore order and good government (Raychaudhuri : Political History of Ancient India, 4th edn, pp. 302 f.). See also Jāt. I. 326, III. 514, VI. 156, 493 ff.

² It is not to be assumed, however, that every such village with localised trade formed a close corporation (Jāt. II. 405, IV. 207, V. 337).

of crafts and professions and their concentration in fixed areas gave birth to the medley of castes and sub-castes which, formerly a more or less priestly hypothesis, now began to harden into rigid social partitions on the basis of occupations tightened with the bonds of heredity, endogamy and exogamy, rules of the table, etc. The corporate unity, combined with localisation of industry, tended towards a narrowness and exclusivism whose dour consequences we are suffering for generations and centuries from the past.¹

The evidences of the Jātakas are fully corroborated in the Sāstra literature. In a rule of the Arthaśāstra (III. 10) it is presupposed that villagers may collectively employ a cultivator (*karṣaka*) on contract advancing wages and food and drink (*cf.* Yāj. II. 193), or a hireling for a sacrificial performance (*prahavaneṣu*). The village collectively appropriates the fine imposed on a breach of the contract. It also appears that it was the compulsory duty of every villager to co-operate in the preparation of a public show (*preksāyām-anamśadah na prekṣeta*) and in beneficial works of public utility (*sarvahite ca karmaṇi*) on pain of fine calculated at double the aid due from him. A person undertaking a public concern must be similarly obeyed by all on pain of fine, Brāhmaṇas and even superior folk not excepted (*cf.* Yāj. II. 191; Viṣ. V. 73). Villages might also undertake the combined performance of a sacrifice. The chapter is closed with the quotation of a verse :

“ Those, who with their united efforts construct on roads buildings of any kind beneficial to the whole country and

¹ N. Banerji throws out a plausible explanation of the rise of industrial *gāmas*. His plea is that originally the industrial population in each village catered to the requirements of the agriculturist as was the case with most villages in Pāṇini's time (VI. 2. 62.; V. 4. 95). With the increase in demand of their wares, they freed themselves from the tutelage of agricultural interest and withdrew to places where they had better facilities for pursuing their occupation without let or hindrance. Economic Life and Progress in Ancient India, Vol. I, p. 212.

who not only adorn their villages but also keep watch on them shall be shown favourable concessions by the king."

"Rājā desahitān setūn kurvatām pathi samkramat
Grāmaśobhāśca rakṣāśca teṣām priyahitam caret"

Compulsory participation of villagers in a co-operative undertaking involving expenditure and profits is also dwelt upon (II. 1).

In the Dharmasāstras the king is directed to exile a man who violates the agreement of the corporate unit of village or locality (Manu, VIII. 221; Vr. VIII. 9; XVII. 5). The extensive functions of municipal bodies are given by Vṛhaspati (XVII. 11-12) :—

Sabhā-prapā-devagrha-tatāgā'rāma-samskr̥tiḥ
Tathā'nātha-daridrāṇām samskāro yajanakriyā
Kulāyanam nirodhaśca kāryam asmābhiramśataḥ
Yannaitallikhitam samyak dharmyā sā samayakriyā

Thus the municipalities not only undertook sacrifices and building and irrigation works but also communal charities on behalf of the indigent and relief of the afflicted in times of famine and other national calamities ('kulāyananirodhah' is explained in the Viramitrodaya as 'kulāyanā-durbhiksādi apagama-paryantasya dhāraṇam'). Elsewhere it is directed that the funds of public associations may be properly spent on behalf of the helpless and the decrepit (XVII. 23).

This is only a matured form of the communal village life manifested in the *ganas* of the lawgiver's time.¹

The corporate village life expressed itself in no less pronounced manner in a lighter and festal mood. It has been shown by a German scholar that the Vedic *sabha* served as the modern club-house after the closure of its business.² Later

¹ For 'gana' used as corporate rural or municipal assembly, see R. C. Majumder: Corporate Life in Ancient India, 2nd ed., p. 138.

² Zimmer: Altindisches Leben, pp. 172 ff.

the *samāja* assumed a similar rôle. It had a fixed site (Mbh. XII. 69. 11; Jacobi, Jaina Sutras, II. p. 117) where it organised dances, songs, music, recitations, acrobatic feats and conjuring tricks (Dn. XXXI. 10; cf. Cv. V. 2.6).¹ The *pekham* in the Dīghanikāya, I. i. 13 is explained by Buddhaghosa as *naṭa-samajjā*. The Jātakas use the term as fairs in general (I. 394; III, 446. 541). Among the variety performances of the *samajjā* were combats of elephants, horses, buffaloes bulls, goats, rams, cocks and quails; bouts at quarter-staff, boxing, wrestling, sham-fights, roll-calls, manoeuvres, revues, etc. (Dn. I. i. 13; Jāt. III. 541. Introductory story of Pācittiya 50, Vin. IV. 107). The Vinaya passages show that at these food was provided as well as amusements. These platforms Aśoka used to propagate his *dhamma* by showing the people the spectacles of the *vimānas*, *hastins*, etc. (R. E. IV). The description of the *goṣṭhis* by Vātsyāyana (K. S., Ch. IV) embodies a more unbridled vein of hilarity and amusement (not at the sacrifice of enterprises of public benefit for that matter) and is a contrast to the puritan denunciation of fairs and fair-fans in the Buddhist Suttas (Dn. I. i. 13; XXXI. 10; Cv. I. 13.2; V. 36).

Sanskrit works and inscriptions profusely deal with local

From tribal autonomy to corporation and democracy. units, the democratic bodies that governed them and the popular clubs and committees

under the various and not strictly distinguished appellations of *śrenī*, *gana*, *jāti*, *pūga*, etc.; of *sabhā*, *samiti*, *nikāya*, *pariṣad*, *samūha*, etc.; of *goṣṭhi*, *samāja*, and so on. These bodies had their laws held sacrosanct, they enjoyed autonomy in their affairs, administered judicial and municipal functions, had their funds and finances and sometimes even minted coins in

Rhys Davids suggests that these may have been "survival from exogamic communistic dancings together."—Dialogues of the Buddha. *Natas* and *nartakas* figure prominently in *utsavas* and *samājas* conducive to the well-being of the state in the Rāmāyaṇa, II. 67.10; 100.44.

their name (Basārh seals).¹ The Sākyas, Licchavis and similar republican clans who held their deliberations in the *santāgāra*, exhibit in fullness the original communal brotherhood. The assemblies of heads of families as seen in the Jātakas and of elders as manifested in the Smṛtis and the Arthaśāstra reflect the earliest stages of the growth of tribal communities. The testimony of later Smṛtis (Vṛhaspati, Nārada, etc.) and of inscriptions not only south Indian demonstrates that these early nebulous institutions later evolved into well-defined structures and functional divisions and the full-fledged idea of corporation.² The original tribal autonomy was replaced by a democracy with its constitutional conception and implication fully understood.

¹ An elaborate catalogue of these institutions and their respective functions is given in Radhakumud Mukherji's Local Self-government in Ancient India.

² See E.I. I. 20, XIV. 14, XV. 7.

CHAPTER V

PASTORAL LIFE AND ANIMAL PRESERVATION

Cultivation of livestock a universal pursuit. Pastoral magnates. Forest pens. The herdsmen. Animals reared. Royal monopoly of elephant and horse.

Protection of fauna. Ethical and economic view of protection. No proscription on the score of sacredness or impurity of animals. Deification of cow a later development.

As land was plenty and as much of it as desired might be acquired by means of an axe and a spade, it remained

<sup>Cultivation of live-
stock, a universal
pursuit.</sup> the chief and most ostensible means of livelihood for the people and Megasthenes rightly observed that the mass of them were

tillers of the soil. This is not to mean, however, that they were exclusively dependent on cultivation. The villagers pursued a variety of cottage industries which sometimes formed the economic basis of village organisms.¹ Agriculture, cattle-rearing, trade and usury constituted the fourfold *vārttā* or pursuits open for the amassment of fortune. Of these, cattle-rearing is in the Epics as important and universal an occupation as farming (Rām. II. 67.12 ; 100.45 ; Mbh. II. 5.79 ; 13.2 ; XII. 88.28). Manu thinks it derogatory to a Vaiśya not to keep cattle, the auxiliary of agriculture (IX. 327), for, "when the Lord of creatures created cattle, he made them over to the Vaiśya, and a Vaiśya must never wish—'I will not keep cattle'." (328). Almost *verbatim* this is repeated in the Sāntiparva (60. 22,25) and it is added that "if a Vaiśya wishes to tend cattle no one else should undertake that task."

¹ See *Infra*, Book II, Chs. III-V.

This is one more and a glaring instance of how the priestly caste-theory was sought to be foisted on society against an overwhelmingly current practice and a warning to the historian against indiscriminate use of the Sāstra data. In every sort of available literature not excepting the very Mahābhārata there are teeming records that live-stock and animal farming were the business of no particular section or group or of agriculturists at that. The kings themselves, the so-called Kṣatriyas, led the way and cattle-wealth was the mainstay of their household finances, whether it be of the emperor of Kośala (Ram. II. 100.50) or of the princeling of Kāsi (Jat. I. 240). Besides horses, elephants, cows, sheep and goats, they maintained buffaloes, camels, asses, mules, swine and dogs for a variety of purpose (Arth. II. 29). In the Dhūmakāri Jātaka the high-bred (*vāsetṭho*) Brāhmaṇa is a goat-keeper (III. 401). All the seventy families in a Brāhmaṇa hamlet on the slopes of the Grdhrikūṭa mountains near Rājagrha took to cattle-breeding as the sole means of livelihood (Ch. Dhp., Beal's Tr., p. 64). The *setthis* or the merchants of the metropolis were no exception (Jāt. I. 388); and Megasthenes' third caste who "lead a wandering life and live under tents" (Str. XV. i. 41) consists of herdsmen and hunters, evidently the nomadic aborigines¹ who went under the brand of Sūdra or Mleccha according to priestly caste denomination. The universality of cow-keeping and cattle trade is manifest in the common use of cows as a standard of value and medium of exchange in the transitional stages between barter and money transactions.

¹ Such Bohemians are seen on the marches of Benares purveying with animal trade in Jātakas, IV. 289. According to Sanskrit works the *ābhīras* were pastoral tribes who inhabited the lower districts of the North-West as far as Sind. The Periplus (41) notes that "the people pastured there very many cattle."

Thus animal husbandry was among the systematic occupations of all classes of people—from the pedigreed royal race down to the despised gipsy tribes, *Pastoral magnets.* and it was a respectable profession not unbecoming a young grandee (*kulaputto*, Mn. 13). For some it was the sole profession, for others it was a supplementary income with agriculture which was their habitual support. Of the former, some maintained extensive farms and rose to the highest rung of the economic ladder as pastoral magnates akin to the multi-millionaire (*asītikotidhanam*) agricultural and industrial lords. Dhaniya, the son of a *setthi* in Vedeha lived on cattle-farming (*goyutham nissāya jivati*, *Paramatthajotikā* on Sut. I. ii), and owned no less than 30,000 heads of cattle, of which 27,000 were milch cows (*timsa-mattāni gosahassāni hontī sattavisatisahassa gavo khīram duyhanti*, *ibid.*) and worked a gang of slaves and hirelings in his establishment (*ibid.*). The lucid details of the Dhaniya-sutta interestingly set forth how he prided in his earnings, in his luxuriant meadows for pasture, in his cows and calves and bulls as lords of the herd and had his calves kept in stockade with stakes driven in strong and bound with ropes of *muñja* grass. The *gahapati* Mendaka enjoyed a bigger farm which had to be managed by as many as 1,250 cow-keepers (*addhatelasāni gopālakasatāni*, My. 34.19). The kings of certain states like *Virāṭa* of Matsya ranked with this class and in the Arthaśāstra's conception of their economic rôle, they appear as foremost pastoral lords maintaining a host of employees in charge of classified herds according to their productivity (II. 29).

Apart from the professional animal farmers, every villager used to keep a few animals for draught purposes or for dairy or meat supply to his own household. The village maintained herdsmen in common on pay or on a share of produce, who grazed them in the pasture and forest, brought them back every evening and counted out

to the several owners (An. I. 205; M. Dhp. Com. I. 157, cf. Rv. X. 19. 3 f.)

The herdsmen, whether they be independent farmers or under the employment of others, are often found to

Forest pens. tend the herd in the forest and keep them

there in a pen. The goatherd Brāhmaṇa Dhūmakāri took a great flock of goats, made a pen in the forest, had a smoking fire to keep away gnats and lived on milk and the like tending his goats (mahantam ajayutham gahetvā araññe vajam katvā tattha ajā thapetvā aggiñ ca dhumañ ca katvā ajayutham patjagganto khirādīni paribhuñjato vasi. Jāt. III. 401). An abandoned mountain enclosure (giribhaja) was deemed a safe resort for their goats by certain goatherds (Jāt. III. 479). A neatherd is seen to go from his habitat to tend cattle in their sheds (gokulesu) in the forest (Jāt. III. 149). A *setthi* had a herdsman who, when the corn was growing thick, drove the cows to the forest, kept them there at a shieling and brought the produce from time to time to the master (Tass'eko gopālako kitthasambādhasamaye gāvo gahetvā araññam pavisitvā tattha gopallikam katvā rakkhanto vasati setthino ca kālena kālam gorasam āharanti, Jāt. I. 388).

The illuminating phrase '*kitthasambādhasamaye*' gives a clue to why the herds were taken to and kept in forests in spite of great inconvenience and constant threat from wild beasts and cattle-lifters. Vast expanse of arable land stretched around the homestead land of the village. Beyond that was pasture land interspersed with wild tracts or dense forest infested with the denizens. To leave the multitudinous flocks and herds to graze near about the verdant *kedāra* would be dangerous for the harvest despite all the attention and watchfulness of a few herdsmen. They had, therefore, to be taken and kept away in the distant woods whence it would be troublesome for keepers and dangerous to the crops to

bring them home every day.¹ This contingency, of course, did not arise in places where there were extensive pasture lands outside the *khetta* or where the herds were comparatively few to manage.² Again, from the instances cited above, it appears that the forest *vajas* were temporary sheds, for after the harvest the cattle is brought back and left in the bare field to graze.

This custom illustrates what a grave responsibility and
The herdsman. thankless job was the herdsman's. The depredation of lions and tigers (Jāt. I, 388, III. 149, 479; Dn. XXIV. 2.5; Arth. II. 29; Mbh. VII. 1.24, 95.23) was not the only menace to prevent; much more troublesome to cope with was the perpetual interference of thieves. Cattle-lifting was a universal crime indulged in equally by the smallest pilferer (Jāt. I, 140, IV. 251, VI. 335) and by the suzerain emperor of Jambudwipa (Mbh. III)³ and such was its magnitude that the author of the *Arthaśāstra* was exasperated to laying down that thieves of cattle and abettors are to be put to death (II. 29).

Apart from protection against brutes and thieves, herds-men had other responsibilities classified into 11 qualities in the Buddhist *suttas* calculated to bring success in looking after the herd and in promoting its increase. The competent man (*i*) has knowledge of form (*rupaññu*), (*ii*) has an eye for marks (*lakkhaṇakusalo*), (*iii*) gets out ticks (*āsātikam sātētā*), (*iv*) dresses sores (*vanam paticchadetvā*), (*v*) smokes out the lairs (*dhūmam kattā*), (*vi*) knows about fords (*tittham jānāti*) and (*vii*) watering places (*pītam jānāti*) and

¹ It is for this reason that a cowherd who wishes to remain in the village (*grāma-kāma*) should be as scrupulously avoided as a king who does not protect, a preceptor who does not teach or a priest who does not know the scriptures, Mbh. XII. 57.45.

² The pasture ground with a goatherd's banian tree on the bank of Neranjara was no wild tract but an open space.

³ Cf. Mbh. I. 215; Ep. In. VI. 16. B; VII. 4.

(viii) roads (*vīthim jānāti*) and (ix) pastures (*gocarakusalo*), (x) does not milk dry (*sāvasesadohī*) and (xi) tends with special attention the bulls that are the sires and leaders of the herd (*te usabhā gopitaro goparinayakā te atirekapujāya pujetā hoti*, Mn. 33, An. V. 350). The Arthaśāstra rule requires of him the knowledge to treat cow diseases and ford them safely (II. 29). The knowledge of *tittham* is further illustrated in the Majjhima nikāya (34) where a man courts disaster to his herd in trying to drive it across the Ganges where there was no ford (presumably there was miry or steep bank, strong current or a cataract or whirling pool), and another safely drove it across. Here as well, preference is given to the sires and lords of the herd.

The Arthaśāstra wants the best herd to be entrusted for a fixed wage (*vetanopagrāhikam*) for otherwise they may be spoiled by overmilking. Herds of the next grade are surrendered for a fixed amount of dairy produce (*karapratikara*), viz., 8 *vārakas* of ghee per year which the owner will receive. Only the useless and abandoned lot (*bhagnotsṛtakam*) is given for a share of dairy produce which is fixed at 1/10 (II. 29). There is a touch of realism in the joke flung at Nāgasena by a Brother that he was carrying his canonical lore for the benefit of others just as the herdsman tends cows while others enjoy the produce (*seyyathā pi gopālako gāvo rakkhati aññe gorasam paribhuñjati*, Mil. p. 18). Truly, the herdsman's was not an enviable job.

To turn now to the different species domesticated and their economic utility. In the Mahābhārata is given that lion, tiger, boar, buffalo, elephant, bear, and ape are the seven wild animals (*āranyāḥ*); and cow, goat, sheep, man, horse, mule and ass are seven domestic animals (*grāmyāḥ*, VI. 4. 13 f. Bengal text). Of the former group, boar, buffalo and elephant are found to be reared. These animals were very often cultivated by single species. We come across, for example, not only the *gopālaka*

and *ajapāla* but also the *pindāraka* and *sukaraposaka* (Arth. II. 29; Dn. XXIII. 25).¹ The camel and the dog are conspicuous in royal stables and kennels² and the fowl noise about the village farmyard. The ducks are not seen in domestic animalry. Cow, buffalo, goat and sheep were reared for dairy (*gorasam*) as well as for meat supply and skin. Swine and fowl were meant entirely for consumption. The ox alone drew the plough. The bull, mule, ass and camel were used for draught³ and could be let out on hire by owners (Str. XV. i. 41; Jāt I. 195). The dog assisted herdsmen to reconnoitre grazing forests (Arth. II. 29) or guarded royal apartments (Jāt. I. 175) or served as hunting accomplices to the king (Jāt. IV. 437) or nomadic huntsmen (Jāt. VI. 528). The horse and elephant were employed according to their varied nature for draught, riding and war. Animals used for draught purposes were generally castrated and sometimes their horns were cut off (Mbh. XII. 15.51). The beasts, wild and domestic yielded a large variety of animal produce, *viz.*, skin, claw, horn, hoof, plume, tusk, wool, etc.

Megasthenes says that the elephant and horse were royal Royal monopoly of monopoly (Str. XV. i. 41 ff.). In the elephant and horse, Mahāvagga elephants and horses are said to be elements of royalty (*rājangam [sic]*, VI. 23. 10 f. cf. Mil. p. 192; Mbh. XIII. 102.13). The testimony of the Jātakas

¹ The varieties of animal flesh were also disposed of from separate stalls in the market place and different sets of stockists and butchers thronged on them; e.g., the cattle-butcher (*goghātako*), sheep-butcher (*orobhiko*), pig-sticker (*sūkariko*), fowler (*sākuntiko*), deer-stalker (*māgaviko*), etc., Mn. 51. cf. Iguana-trapper (*godhaluddako*) in Jātaka I. 488. Rhys Davids observes the absence of any custom of breeding cattle for the meat market (Buddhist India, p. 94). Against this may be noted the frequent reference to the slaughter house (*suna*; *parisunam*).

² The mention of dogs in royal household is frequent in the Rāmāyaṇa. Alexander received 150 dogs as present from king Sōpeithēs (Str. XV. i. 31).

³ On rare occasions also horse and elephant (Arth. II. 30 ff; Mbh. V. 132. 21; Pliny. VI. 22; Solin, 52. 6-17; Arr. XVIII).

(assā nāma rājabhogā, III. 322) and of the Arthaśāstra favours this view. Medhātithi's note on a text of Manu is concurrent, on the basis of which Bühler argues that the taming and sale of elephants used to be a royal monopoly.¹ This was quite in the fitness of things in view of the great extent to which victory in war depended on these two animals, particularly the latter. But to assume a cast-iron rigidity at all times and in every state would be going beyond the mark. According to Arrian a woman could sell her chastity at no price below an elephant (XVII. cf. Str. XV. i. 43). Certainly no mere joy-ride is meant. Elsewhere Greek writers testify to elephants being used by certain peoples for hunting, for ploughing and for riding (Pliny, VI. 22; Solin. 52. 6-17; Arr. XVII). In the Kulāvaka Jātaka, villagers are given an elephant by the king. In the Mahābhārata elephants and horses sometimes appear among royal presents at sacrifice (VII. 57; 68.31; XIII. 103.25). The scīthi's son, Sōṇa Kolivisa of Campā had retinues of seven elephants (*i.e.*, each of the seven was a lord with a number of dames attached to it,—as explained by Buddhaghosa, Mv. V. 1.29). Of course, these are instances outside a general principle followed by Indian royalty and there is no question that the horse and elephant were *rājangam* or *brutes royales*.

The rich Indian fauna for which Greek writers have a Protection of fauna: chorus of praise was consciously preserved *ahimsā*. against destruction and annihilation despite the rapid progress of Aryan exploration and the clearance of primeval forests. The principle of protection and promotion of animal wealth received a dynamic impetus from the ethical principle of *ahimsā* or inviolability of all forms of life which was popularised but by no means invented by

Buddha and Mahāvīra.¹ Its origin is traced in the Vedic teachings and the earliest Smṛtis. Manu wants ascetics to walk always carefully scanning the ground "even with pain to his body" and prescribes atonement for animals killed without intention (VI. 68 f.). In the Śāntiparva not only killing of birds and animals is marked out as sin (35.28, 36.34, 165.56 f.) but also all sorts of cruelty and physical oppression are severely indicted (261.37 ff.; XIII. 23.73, XIV. 28.16 ff.). The "three long fasts"² which were observed by Buddhists with great *eclat* in the days of Yuan Chwang's visit and during which no slaughter of animals was allowed because Indra was believed to be carrying on a searching inspection of popular conduct, show that these were originally a popular rather than a Buddhist institution.² Indian folk-lore abounds with such idealised stories of animal-love as those of the prince who flung his body from a mountain peak to relieve a starving tigress with her cubs, of a king who gave his pound of flesh to a hawk in order to save a fugitive pigeon and prince Jīmutavāhana who offered himself to be devoured by Garuda for a *nāga*'s sake,—all of which formed a common heritage for canonical books of orthodox and heretical sects. The same moral is deftly inserted in the prelude of the Rāmā�ana where the sight of a stricken bird and a wailing mate stirred the feelings of an illiterate sage finding vent in spontaneous metrical effusion which heralded the great Epic.

The Sanskrit literature,—the early Epics with their naïve simplicity and later *kāvyas* in their ornate style,

¹ Mark the parallelism in the following verses :

Sukhakāmāni bhūtāni yo dāñdēna vihinsati
attano sukham esāno pecca na labhati sukhan : DhP. 131
Yo 'himsakāni bhūtāpi, hinasti ātmasukhechchayā
sa jivampśca mṛtaśca na kvacit sukham edhate : Manu, V. 45
Ahiṁsakāni bhūtāni dāñdēna vinihanti yaḥ
ātmānāḥ sukhām icchan sa pretya naiva sukhī bhavet : Mbh. XIII. 113.5.
Watters : Yuan Chwang. Vol. I, pp. 204 f.

portray the working of the doctrine of *ahimsā* in the *āśramas* or sylvan retreats of venerable saints where birds and beasts were protected from injury and stayed in perfect harmony with men. In the Rāmāyaṇa such a safe resort was the arbour of Mātaṅga where shedding of blood was sacrilegious, to be terribly avenged. In the Mahābhārata occurs the legend of Duṣmanta who steps into Kanva's hermitage in an orgy of animal slaughter and is immediately transported from an atmosphere of panic and fury to one of calm and concord where monkeys, bears, elephants, tigers and snakes live unharmed with holy ascetics and *kinnaras*. Such descriptions in the Epic *ākhyanas* approximate to actual life and are remarkably immune from poetical fancy and artistry which is displayed in later sophisticated literature written under court influence or for the edification of a refined and hyper-sensitive public.¹ Even the Arthaśāstra, a work that certainly does not err on the side of religiosity, affirms that all creatures are protected in a forest set apart for religious pursuits (II. 2).

That later poets revelled in depictions however artificial indicates that the idea of peace and amity in the animate world had, apart from any speculative tenet, an aesthetic and sentimental appeal among the people for whom they catered. This and the effect of meat diet on human constitution led to a general aversion for animal food among those Brāhmaṇas who observed the code. Instances are rare in ancient literature of pious Brāhmaṇas taking flesh except on ceremonial functions or after worship of the manes. The Rākṣasa Ilval could not bait the Brāhmaṇas with mutton unhallowed by the *mantras* or without dedication to ancestors (Rām. III. 11. 57). The law-givers emphatically interdict it unless taken in conformity with the law, *i.e.*, after Vedic rites and

¹ Cf. Kālidāsa's Sakuntalā, Act I, and Bāṇa's Harsacaritam, the scene of Divā-karamitra's forest academy.

sacrifices, under the threat of unexpiable sin and eternal perdition (Viṣ. LI. 59-78 ; Manu, IV. 38-52 ; Yāj. I. 180 f.).

But the doctrine or sentiment of *ahimsā* could not arrest Protection from economic view. animal carnage,—among the Brāhmaṇas for sacrifice, among the ruling classes for sport and among the lay public of all grades for food and articles of luxury and use—such as skin, feather, bone, horn, hoof, etc. (Jacobi : J. S., I: p. 12). In the Mahābhārata a long lecture on the virtues of *ahimsā* and abstention from meat-diet (XIII. 115 f.) is followed by exceptions made in favour of sacrifice and hunting for the royal race. Of Brāhmaṇical protests against animal sacrifice there are only faint traces and even these half-hearted and conditioned apologies may have been inspired under Buddhist influence (Mbh. XII. 264 ; 338. 4 ff ; XIV. 91). The law-givers legislated for the guidance of Brāhmaṇas alone. Manu even allows a Brāhmaṇa to adopt the calling of a butcher (*māṁsavikrāyin*, III. 151) in exceptional circumstances. Buddha himself allows fish and flesh to his disciples on the three conditions of not having seen, heard or had suspicion (Mv. 31. 14 ; Mn. 55). Of checks against destruction of animals for the above purposes there are only meagre evidences. The social stigma attached to the professional hunter and purveyor in flesh (*niśāda*, *kirāta*, *heḍḍaka*, *luddaka*) in the Epics and the Jātakas may have been a partial safeguard and Megasthenes' observation of hunters " who alone are allowed to hunt " (Str. XV. i. 41) probably reflected the general relegation of hunting profession to those degraded castes.¹ An anecdote in the Mahābhārata tells how Yudhiṣṭhīra spared the remnant of the fauna in a forest where the Pāṇḍavas lived by hunting and repaired with his party to the Kāmyaka forest abounding

¹ Apart from the despised classes who took to hunting as a means of livelihood, sport as an enjoyment is found confined to kings and chieftains. We hardly come across agricultural and mercantile classes indulging in it; and if and as soon as they take to it for living they get the brand of degradation.

in wild life (II. 256). To save animals from death at the altar, Buddha's voice was no doubt effective for a time. Restrictive measures were taken by strong monarchs under Buddhistic influence—such as Aśoka and Harṣa. But these were directed only against unnecessary cruelty and wanton slaughter and they did not dare to interfere in consumption of animal food as such nor did they attach in their injunction any special sanctity on animal life.

Strabo's remark on Megasthenes' authority that the Brāhmaṇas "eat flesh but not that of animals employed in labour" (XV. i. 59), whatever truth it may contain, reflects at any rate a sound economic sense which in some quarter regulated animal diet. The ordinances of Aśoka himself are not purely altruistic. He is solicitous for the food, comfort and medical treatment of cattle as of men (R. E. II; P. E. VII) and he boasts of having conferred various benefits on bipeds and quadrupeds, on birds and aquatic creatures even to the "boon of life" (a pāṇa-dakhiṇāya, P. E. II). But in his famous abstinence ordinance where the following animals are declared inviolable—*suka* (parrot), *sālika* (maina), *aluna* (?), *cakriyāka* (ruddy goose), *hāṃsa* (wild goose), *nandimukha* (a kind of bird), *gelāta* (?), *jatuka* (bat), *ambakapilika* (queen ants), *dali* (terrapin), *anathika maccha* (jelly fish), *vedaveyaka* (?), *gamgapuputaka* (?), *samkujamaccha* (skate-fish), *kaphata sayaka* (porcupine), *pamnasasa* (squirrel ?), *simala* (?), *sam-daka* (wild bull), *akapinda* (iguana?), *palasata* (rhino), *seta kapota* (white dove), *gāma kapota* (domestic dove), he adds the significant clause "which is neither useful nor edible" (ye paṭibhogam no eti na ca khādiyati, P. E. V). That the spirit of the edict is not less economic than altruistic is further proved by the forest law—"forests must not be burnt either uselessly or in order to destroy living animals." Other prohibitions are against pregnant and milch goats, ewes and sows with young ones below six

nonths and against the preserves in fishing ponds and elephant parks on the three *caturmāsīs*, on the Tisya full moon luring three days, *viz.*, the 14th, the 15th and the first *itihi* and unfailingly on every fast day. Feeding of live animals with live animals, caponing of cocks, castration of bulls, goats, dams, boars and other livestock on certain days and branding of horses and bullocks on the same days are forbidden. The keynote of these regulations is the checking of cruel practices and preservation of the different species, and if the emperor's heart ever yearned for total abstinence all he could do was to set his own example by rigorously curtailing meat-diet in his own kitchen (R. E. I.).

The author of the *Arthaśāstra* is fully aware of this risk of unscrupulous drainage of animal resources and lays down practical rules for their protection. Animal produce engages his attention as much as other forest produce (II. 17). His list of inviolable birds echoes Aśoka's edicts and betrays equal care for the protection of the wild fauna against extermination (II. 26). With this view again, he gives directions for the comfort, health and safety of the livestock. Elaborate rules of dietary are framed for the guidance of the superintendents of cattle, horses and elephants with reference to their age, maternity, nature of work or use derived from them. The details of stable construction are worked out with vigilant eye to the comfort and sanitation of the beasts. A host of attendants and paraphernalia are assigned to the horse and elephant stables—trainers, feeders, cooks, watchers, grooms, vets, drivers, binders, sweepers, and so on (II. 29-32).

The preservation of the four-footed, feathered and finny races is sought with assiduous care in other rules of the economist. For this specific purpose the *abhayāranya* is set apart and none are allowed to “entrap, kill or molest deer, bison, birds and beasts protected thereunder.” One-sixth

of live animals shall be let off in forests under state protection. Discrimination is made, moreover, in the amount of fines against the killing of innocuous creatures that do not prey upon others (II. 26). Young elephants (*bikka*), elephants that would breed (*mugdha*), tuskless elephants, diseased elephants and elephants suckling cubs (*dhenuka*) comprise the immunity list formed to ensure perpetuation of the prized stock (II. 31).

Greek writers testify to the prevailing practice of letting off young and old elephants and those of weak constitution in the forest from the haul (Str., XV. i. 41, 43; Arr. XIV). Elephants are reserved in special forests (*nāgavana*) and for the killing of an elephant one pays with his life (Arth. II. 2). Grooms and drivers are threatened with fine at the slightest breach of rules inculcated for their comfort. "Leaving as much as is equal to twice the circumference of the tusk near its root, the tusks shall be cut off once in $2\frac{1}{2}$ years in the case of elephants born in countries irrigated by rivers (*nadija*) and once in 5 years in the case of mountain elephants" (II. 32). The reason for this jealous attention is given as—"It is on elephants that the destruction of an enemy's army depends" (VII. 11).

In the case of domestic creatures, needless cruelty and victimisation is guarded against. Animals are to be slaughtered for flesh only in the *abattoir* (*parisunam*) on pain of fine (II. 26); the rule seems to have been observed in current practice according to the evidence of the Pali canonical works. Cruel pastimes among herdsmen such as bull-fighting stand outlawed (*cf.* Jāt. IV. 250). Fines are enjoined for neglecting nasal perforation in proper time for stringing draught beasts to the yoke. Milking of cattle is allowed twice a day during the rains and the autumns, but in the dry winter and summer seasons only once on pain of the cowherd losing his thumb. Once in six months sheep and other animals shall be shorn of their wool (II. 29).

Stud bulls, bulls let out in the name of village deity (*grāma-devavṛṣāḥ*) and cows within ten days of calving are exempt from penalisation for trespass. Trespassing beasts from reserve forests "shall be brought to the notice of forest officers anddriven out without being hurt or killed." Ropes and whips only are to be used in case of stray cattle and any injury to them incurs the penalty for assault (III. 10). Livestock is protected along with other properties of a householder by laws of torts. "For causing pain with sticks, etc., to minor quadrupeds, one or two *panas* shall be levied; and for causing bleeding to the same, the fine shall be doubled. In the case of large quadrupeds not only double the above fines, but also an adequate compensation shall be levied (III. 19).¹

The importance of the protection of animal trade is fully realised. In assessing the toll dues on merchandise, bipeds and quadrupeds are placed in the scale of maximum preference along with other commodities the duties of which are charged between $\frac{1}{5}$ and $\frac{1}{25}$ of value. The *gopa* or village accountant is entrusted not only to keep a register of citizens but also of bipeds and quadrupeds in a village. The spies are likewise deputed to ascertain the total number of men and beasts (II. 35).

It is interesting to note that in early Indian literature, Sacredness or impurity of animals. secular or sacred, no consistent attempt is made at proscription on the score of sacredness or impurity attached to particular beasts. The inviolability of cow as a divine creature is not an ancient custom and probably originated in later days of syncretisa-

¹ Manu's scale is :

Fine for killing of large animals, cows, horses, camels, elephants, etc.—	500	<i>pana</i>
„ injuring small cattle	200	"
„ „ beautiful wild quadrupeds and birds	50	"
„ killing donkeys, sheep and goats	80	" (5 <i>māsa</i>)
„ a dog or a pig	16	" (1 „)
		VIII. 296-98.

tion with foreign barbarians, crystallising still later when Hindu society was reconstructed on hidebound dogmas and practices. In its rules on cow slaughter, the Arthaśāstra wants the immunity of only calves, milch cows and stud bulls (II. 26). Among Aśoka's list of inviolables "which are neither useful nor edible," is included the "samdaka," the phrase is a pointer to the rendering 'wild bull.'¹ In the Vedic, Buddhist and classical Sanskrit literature, there is no dearth of allusions to cow-killing or the taking of cow's flesh. The epithet 'aghnya' occurs in the Rg-veda with reference to cattle, but practice is all to the contrary.² In the Sata-patha Brahmana, Yājñavalkya is fond of tender beef (III.

¹ Cf. "..... even sheep, they say, run wild there, as well as dogs and goats and oxen, which roam about at their own pleasure being independent and free from the dominion of the herdsmen. That their number is beyond calculation is stated not only by writers on India but also by the learned men of the country " Aelian, XVI. 20.

² For illustration see Macdonell and Keith : Vedic Index, II, p. 145.

The following verse of the Rg-veda is of interest as reflecting the origin of the idea of divinity :

Mātā rudrāṇāṁ dūhitā vasūnāṁ svasā-dityānāṁtasya nābhīḥ
pra nu vocām cikītuṣe janāya mā gām-anāgām aditīm vadhiṣṭha

8. 101. 15.

The Taitiriya Āraṇyaka adds to this verse :

Pivāūdakam tṛṇānyattu. Om-utsṛjata.

The interpretation of the word 'utsṛjata' by scholars of different ages helps us to understand which way the wind was blowing. Jaimini gives the gloss :

tāmpāstāṁ hate pāpiṇānameva taddhate 'tha yadi gām-utsṛjet-tāṁ-etenai
'otsṛjed-gau-rdhenu-rhavyā : Sr. Sūt. (kārikā 15 substitutes 'upāgatām' for 'havyām,' making the meaning clearer). So the sacrifice of a dry and old cow with the holy mantras amounts to the slaughter of sin. It is lined up with the scape-goat.

The gloss in the Grhyasūtra goes :

r̥tvig-ācāryyah snātako rājābhīṣiktaḥ priyah sakhā śrotriyaśceti tebhya ātithyam
gām kuryāt-tāṁ-ātithaya iti prokṣet. 1. 12.

Is the cow to be given away to guests or slaughtered for their entertainment? The latter deduction agrees with the similar injunction in Āpastamba Grhyasūtra and with Pāṇini's derivation of 'goghna.' Thus even a snātaka and a śrotriya is not averse to beef.

Compare Sāyāṇa's commentary on 'om-utsṛjata' : 'vadhyām-enām rājagavim pari-
tyajata.' So a dry cow is not to be slaughtered whether at sacrifice or for guests but let go to graze at will. Sāyāṇa represents an age when cow-killing was an anathema.

1. 2. 21). According to Pāṇini 'goghna' means a 'guest' because a cow is killed for him (III. 4. 73). Āpastamba permits the slaughter of a cow at the reception of a guest, at the worship of the manes and at nuptial celebrations (Grhyaśūtra, I. 3. 9; cf. Sat. Br. III. 4. 1. 2; Manu, V. 41; Vāś. IV. 8; Sāṃ. II. 16. 1; Viś. LXXX. 9; Yāj. I. 19). In the beginning of Act IV of Bhavabhūti's Uttararāmacarita a heifer is stated to be slain by Vālmīki in honour of Vaśiṣṭha's visit to his āśrama.

In the Buddhist works the 'goghātaka' is a familiar figure and his profession, according to the Dasabṛahmāṇa Jātaka was widely followed by straying Brāhmaṇas (IV. 361 ff.). Slaughter of ox for flesh was very common (Sut. III. viii. 7; Jāt. II. 50, 135; VI. 111.) and there were special slaughter-houses for beef (gāvaghātanam, Mv. V. 1. 13). Even cows did not necessarily find exemption (An. IV. 137; Ch. Dh., p. 60; Āpast. I. 5. 17. 30). The *suttas* present this very unedifying spectacle at the most prominent place of the town or village; "As the cattle-butcher or his apprentice, when he has killed an ox or cow, displays the carcase piecemeal at the crossing of the four highroads as he sits" (goghātako vā goghātakantevāsi vā gāvīm vadhitvā cātumahāpathe vilaso paṭibhajitvā nisinno assa, Dn. XXII. 6; Mn. 119).

It rather appears that beef was the commonest of flesh consumed. Similarly there were no strictures laid on grounds of impurity. Swine and fowl often figure in animal husbandry of the lay and clerical folk even in Sacred Books. Aśoka's exemption of pregnant and mother sows indicates that there was no ban on the use of bacon or ham. In the Mahāparinibbāna Sutta Buddha is offered a dish of pork¹ by Cunda the artificer's son (also Ud. VIII. 5). Like the

¹ If *sukaramaddava* is not fungus. See Rhys Davids' note in Questions of Milinda, I. p. 244.

cattle-abattoir, there was the swine-abattoir (*sukarasunam*, Mv. VI. 10. 2) and the pigsticker (*sukariko*) was the dealer in ham in the market as the *goghātako* purveyed beef. In the *Rāmāyaṇa* as well pig and fowl appear as appetising food in the menu of a feast arranged by as good a saint as Bharadvāja (II. 91. 67, 70). In the Chinese Dhammapada a Brāhmaṇa is taking fowl without the least sense of wrong (p. 150). In the Milinda a remarkable cock-lore is evinced (pp. 366 ff.). The testimony of the Jātakas (I. 197) and of the Arthaśāstra (V. 2) is identical. Indeed, oxen, goats, fowls and pigs are the choice animals slain in sacrifice to gods (Jāt. I. 259, IV. 364; Dn. XXIII. 31). In a Vinaya list of unpalatable and inedible food to which the people fell only in famine, occur elephant, horse, dog and snake (Mv. VI. 23, 10 ff.). Fowl, swine and cow never come in the list of animals and birds forbidden even for the Brāhmaṇa's table (Sat. Br. I. 2. 1. 8; Ait. Br. II. 1. 8; Āpast. I. 5. 17. 29 ff.; Manu, V. 11, 18; Yāj. I. 172, 176; Mbh. XII. 37. 24-26). It is only as late as in the Si-yu-ki that beef and ham are classed among non-edibles (Watters', p. 178).¹

From the Vedic times however and throughout the Smṛtis and the Epics there was a vigorous attempt for the prohibition of cow slaughter and protection of the invaluable

Protection and deification of cow.

cattle-wealth : but of deification of cow there is hardly any strong evidence. In the *Rāmāyaṇa* cow-killing (IV. 34. 12; Mbh. VII. 17. 31; 73. 27) and milching a cow just delivered (II. 75. 54) are sins. In the Mahābhārata the good old days are mournfully recalled when the Vaiśyas fed with

¹ High-crested cocks born of Vṛtra's blood (*sikhaṇḍal*) occur as non-eatable to the twice-born and the initiated in the Mahābhārata, XII. 281. 60. In view of the evidences adduced and the composite character of the Śānti-parva, this may be supposed to be a later priestly interpolation, or reflection of a local custom. Of course tame cocks and pigs occur in an exhaustive list of animals prohibited for the Snātaka Brāhmaṇa in Gaut. XXIII. 5 and Manu XI. 157.

care all cattle that were lean and never milked kine as long as the calves drank only the milk of their dam (*phenapāmśca tathā vatsān na duhanti*, I. 64. 22). “Does not milk dry” is a favourite analogy on judicious taxation by kings. Among the glories of Cedi is that lean cattle are never used for draught but are well-fed and fattened (I. 63. 11) and it is only in the dark days of *kali* that men will employ cows and one-year-old calves for drawing the plough and carrying burdens (III. 189. 27). The reason for this solicitude is that the cow is the foremost of all quadrupeds as surely as the Brāhmaṇa is among the four castes (VI. 123. 34 ; XII. 11. 11). Hence Skanda is appointed leader of divine hosts for the well-being of cows and Brāhmaṇas (*gobrāhmaṇahitāya ca*, III. 228. 23 ; XII. 21. 18 ; Baudh. II. 2. 4. 18).

But cattle is the chosen victim for sacrifice in large scale (I. 74. 130). In king Rantideva’s kitchen 2,000 cows and 2,000 other animals are killed daily and the meat distributed so that the fat of these animals form the river Carmaṇvatī (III. 207. 8 f ; VII. 67. 5 ; XII. 29. 123 ; XIII. 66. 43). The reason for this is thus given :

“ ‘The sacred fire is fond of animal food’—this saying has come down to us. And at sacrifices, animals are invariably killed by regenerate Brāhmaṇas and these animals, being purged of sin by incantation of hymns, go to heaven.”

agnayo māmsakāmāśca ityapi śrūyate śrutiḥ !
yajñeṣu paśavo brahmaṇ vadhyante satatam dvijaiḥ !
saṃkṛtiḥ kila mantraiśca te’ pi svargam avāpnuvan ||

III. 208. 11 f ; cf. VII. 67. 4 ; Manu, V. 40-42 ; Vāś. IV. 7 ; Viṣ. LI. 59. 78 ; Yāj. I. 180 f.

Aelian describes with the characteristic bluntness of a foreigner this pious benefaction of the animal race on the part of the priesthood ;

"In the country of the Indian Areianoi there is a subterranean chasm¹ down in which there are mysterious vaults.....Hither the Indians bring more than thrice 10,000 head of cattle of different kinds, sheep and goats and oxen and horses ; and every person who has been terrified by an ominous dream, or a warning sound or prophetic voice, or who has seen a bird of evil augury, as a substitute for his life casts into the chasm such a victim as his private means can afford giving the animal as a ransom to save his soul alive." (XVI. 16.)

Obviously there were two contradictory forces at work. The utility of cow was appreciated but its slaughter for greed was not checked any more than the goat is spared to-day from an understanding of the value of its milk. That the cow was the foremost of creatures was the very reason why it should be sent over to propitiate the gods. Buddha's spirited denunciation of sacrificial rites voiced the necessity of cow-protection on economic grounds. He rebuked the silliness of Brāhmaṇas who had fallen from their older virtues and taken to the evil practice of cow-sacrifice. (The Brāhmaṇas were, by the way, never opposed to cow-sacrifice ; the fictitious allusion is meant only to emphasise the sermon.) Knowing that cows are our benefactors like our parents and givers of food and strength the Brāhmaṇas of old abstained from cow-killing :

" Yathā mātā pitā bhātā aññe vā pi ca nātakā :
gavo no paramā mittā yāsu jāyante osadhā
annadā valadā c'etā vanṇadā sukhadā tathā-
etam atthavasam nātvā nassu gāvo hanimsu te "

—Sut. II. vii. 13 f.

At the instance of Brāhmaṇas of a later date the king sacrificed many hundred thousand cows to the gods (*ibid.*,

¹ Obviously the sacrificial pit. Cf. Jāt. I. 300.

25). The result was that while formerly there were 3 diseases, they now multiplied to 98 (*ibid.*, 28).

Without doubt Buddha was no man to deify cows. The utility of cow is the motive behind the inviolability preached in didactic works. The cow was no fetish of the Indo-Aryans as the Horus or Set was of the Egyptians.¹ If the cow is sometimes found held sacred and adored, the explanation is to be sought in this utilitarian principle rather than in deification (*cf.* Mbh. XIII. 51. 26 ff; 69. 8). The injunction that touching a cow with feet is sin (Rām. II. 75. 31; Mbh. VII. 73. 30; XIII. 93. 117; 126.28 ff.) is to be read with the crimes indicted for cruelty to cows. This utilitarian feeling ultimately led to the abolition of cow-sacrifice and the fitter use of cow in gift (Mbh. XIII. 66.44).² The farthest point toward the sacredness of the cow is noticed in a Jātaka passage. An auspicious bull all white (sabbaseto māngala usabho) belonging to the *gāmabhojaka* is killed by snake-bite and the villagers "all ran together weeping, honoured the dead with garlands and buried him in a grave" (sabbe ekato va āgantvā kanditvā tam gandhamālādihi pujetvā āvāte nikhanītvā, IV. 326). But such honour is bestowed on the horse and the elephant in no less outspoken manner. The *māngalahatthi* (1. 320) is even more prominent than

¹ There is a similitude in the evolution of the cult of the Apis and Mnevis bulls, the representatives of the gods Ptah and Ra in Egypt where these animals were deified and venerated in the Saite age of national decline and the deification of bull, the animal of Śiva, during the foreign subjection of Hindu states. The Śiva with his bull is represented in the coins of the Kuśāṇas and Scytho-Sassanian kings and in a coin of Śāśāṅka, king of Gauda. But it is for the first time and as late as in a coin of the Huna Mihiragula that a bull-emblem of Śiva is seen with the legend 'jayatu vṛṣah' on the reverse. For reference see D. R. Bhandarkar: Lectures on Ancient Indian Numismatics, p. 18.

Did the deification of the cow originate in Indian source and of the bull come from foreign source?

² This statement in the *Anuśāsanaparva* with a lengthy homily of 13 chapters on the greatness of cow is most probably a later interpolation reflecting a time when cow-sacrifice was on the wane. For later, in this very *parva*, gift of beef to the *pitrīs* is enjoined (88. 7).

the *mangala usabha* and has, moreover, the virtue of bringing rain against draught (VI. 487 ff. Cp. Kurudhamma-C). The *hathimangala* or elephant festival is a common affair in the Jātakas. A king used to honour an elephant by having its stall perfumed with scented earth, coloured hangings put round a lamp with scented oil, a dish of incense set there, a golden pot set on its dunghill, coloured carpet spread on its stand and royal food of many choice flavours (Jāt. III. 384. Cf. IV. 92). A highbred elephant of the *mleccha* king Śālva was frequently worshipped (supūjito) by Dhṛtarāṣṭra's son (Mbh. IX. 20. 3). A horse is seen honoured by a king exactly in the manner of the elephant just referred to (Jāt. II. 291). In the Bhārata war, war-horses are bathed and garlanded (VII. 112. 56). A colt installed as horse of state is sprinkled with ceremonial water (Jāt., II. 287). "During the period of the *cāturmāsya* and at the time when the two seasons meet waving of light shall be performed thrice. Also on new moon and full moon days, commanders shall perform sacrifices to *bhūtas* for the safety of elephants" (Arth. II. 32). "Horses shall be bathed, bedaubed with unguents and garlanded twice a day. On new moon days sacrifice to *bhūtas* and on full moon days the chanting of auspicious hymns shall be performed. Not only on the ninth day of the month *āśvayuja*, but also both at the commencement and close of journeys as well as in the time of disease shall a priest wave light invoking blessings on the horses" (*ibid.*, 30).

These silly rites performed to ward off evil spirits were nevertheless meant to safeguard the interests of state, to protect the sinews of war against all sorts of danger and not to appease animal divinities held in superstitious veneration or fear. They were indispensable in war and sport as the cow was the prized supplier of milk, curd, butter and ghee. If it was sin to touch the animal with feet, here worked the

same Indian psychology which deters the workman from kicking his tool. The cow's udder, the sheep's wool, the elephant's tusk are all subject to protection laws against the cupidity of improvident owners. This sense of utility of animal labour and animal produce accounts for the culture of animal lore and the improvement of veterinary science to which Aelian (XIII. 7), Aśoka and the Arthaśāstra are outstanding but not the only witnesses. The theoretical background of animal preservation in ancient India was the theological doctrine of *ahimsā* and the economic doctrine of protection. The tribal totems of primitive communities among other races which hardened into fetishes or exalted gods of cities or 'nomes' and enjoyed inviolability on grounds of sacredness even when the clans passed beyond the totem stage, were foreign to the Indo-Aryans whose rituals rose beyond animistic level and were fixed on elemental and astral divinities from the earliest traceable times.

CHAPTER VI

FORESTRY

Protection of flora. Sylviculture. Pleasure parks and religious retreats Reserve forests. Strategic and economic value of forests.

While clearance of forests and exploration and settlement of new areas was growing apace with the progress of Aryan penetration towards the east and south, a conscious attempt was made to prevent wholesale destruction of forests and of the wild flora and fauna therewith. Buddha and Mahāvīra issued ordinance for the protection of plant life as much as of animal life (Mv. III. 1-3; Jacobi, J. S. II. p. 357). This agrees with the immunity accorded to all forms of life in the sylvan retreats of saints and ascetics consonant to the tenet of *ahimsā*¹ and with the injunction of the Arthaśāstra on the inviolability of all creatures mobile and immobile (*pradīptā-bhaya sthāvara-jamgama*)² in the *abhayāranya* or forest set apart for religious pursuits (II. 2). Aśoka promulgated an edict that "forests must not be burnt either uselessly or in order to destroy living beings" (P.E. V), probably an echo of Buddha's ordinance upon the *bhikkhus* upon a complaint from the people not to set woods on fire (Cv. V. 32.1). In

¹ In an interesting discourse a sage argues the thesis that trees have life, sense perceptions and the capacity to feel pleasure and pain—the kernel of Sir Jagadis Chandra Bose's discovery. Mbh. XII. 184. 10 ff. Cf. Manu on plants: *antaḥsamjnā bhavanyete sukhaduhkhasamanvitāḥ*.

² *Pradīptābhaya*—“whose immunity has been ordained.” Shamasastri's rendering, “made safe from the dangers of” is plainly inadmissible.

Manu cutting green trees for firewood involves loss of caste (XI. 65). In the Mahābhārata it is laid down that to cut down a tree of the forest is a sin (XII. 32.14; 36.34; cf. Vis. V. 55-59) and setting fire to woods as well as to āśramas, villages and towns is classed as equal to the sin of Brāhmaṇicide (XIII. 24.12). According to the Arthaśāstra one setting fire to timber or elephant forests shall be thrown into fire (IV. 11).

The Epics offer hand in hand illustrations of great
 Sylviculture in the schemes of colonisation and deforestation
 Epics. and of preservation of forests and sylviculture under the solicitous care of the state or community to maintain a perpetual supply of specific products. The prodigious road-making endeavour from Ajodhyā to the bank of the Ganges *en route* the Dāndaka forest involved a large scale clearance of wild tracts (Rām. I. 80); and the great fortnight-long conflagration of the Khāṇḍava may have been the Epic version of another magnificent colonial scheme (Mbh. I. 280; cf. Jāt. II. 358). Instances of opposite nature are not rare. A Candana forest in southern India yielding a large variety of the aromatic was protected by the *gandharvas* (Rām. IV. 41. 41). In Sugrīva's honey-park (madhuvana) none could drink honey or take fruits without special permission. The forest officer Dadhimukha was appointed with a retinue of guards (*vanapāla*) to look to its upkeep and protection. The *vānaras*, overjoyed at the discovery of Sītā, trespassed into the forest and drank up all the honey, ate up the fruits and destroyed the combs, flowers and foliage. The superintendent with his men interfered but they were defied by the intruders and in the altercation which followed had the worse of it. He went to Kiṣkindhyā and reported to his lord but Sugrīva took hint that Sītā must have been traced and gave orders that the *vānaras* might disport in the forest as they pleased (Rām. V. 61-63).

The forests served a manifold purpose. Those which were owned by kings or private individuals (*vana, dāya*) were frequently in the nature of pleasure parks and religious retreats: in Buddhist works.

of pleasure parks, occasional haunts for the owners to disport with their ladies. At the same time these afforded a retreat for the spiritual quest of those whom they might permit. Buddha frequently came to stop at the Isipatana deerpark (*Migadāya*)¹ in Kāsi and there delivered his discourses. Three of his disciples lived in the Sāla forest of Gosinga and when Buddha was about to enter, the keeper (*dāyapāla*) intervened and asked him not to go in and disturb the three *kulaputtas* who were living there for their soul's good (*attakāmārūpā viharanti*, Mv. X. 42; Mn. 31, 128). The Jātakas are familiar with park-keepers in charge of reserve forests which are nevertheless open to the settlement of ascetics (IV. 18, 298, 405; V. 465). These resorts, however, were more in the nature of gardens than forests and the plea for their reservation was less economic than religious and recreative. The Jetavana and the Añjanavana at Sāvatthi, Jīvaka's *ambavana* at Rājagaha and the ārāma of Visākhā Migāramātā were merely gardens where religious occupation was combined with pleasure and no forest as the epithet *vana* may suggest.

The forest in its real sense was not the *vana* but the *aranya*² Reserve forests: in which came under the purview of economic the Arthaśāstra. legislation. The Arthaśāstra displays an advanced knowledge of forest economy and a keen interest for forest conservancy. Forestry commands the author's attention on three grounds and he accordingly divides forests into three classes,—game forests, produce forests and elephant forests (II. 6). The game forests (*mṛgavana*) are set apart for sport, the favourite royal pastime and for the

¹ See Rhys Davids' note in the Dialogues of the Buddha, Bk. I, p. 223.

² The word *vana* is used in both the senses of a park and a forest, while *aranya* exclusively conveys the meaning of a wild tract.

supply of animal produce, among which are skin, bone, bile, sinew, teeth, horn, hoof and tail (II. 17). Of more importance are produce forests (*dravyavana*) which are the source of such materials as are necessary for building forts, conveyances and chariots (VII. 14). Foremost, however, are *hastivanas* for it is on elephants that the victory over an enemy depends. The king is required to keep in repair timber and elephant forests and to set up new ones (II. 1). The forests reserved for breeding of elephants are given special attention (II. 2).

The Arthaśāstra gives preference to elephant forests for the fighting value of the animal. It lays down, moreover, that "a forest containing a river is self-dependent and can afford protection in calamities," i.e.,

Military value of forests. as a frontier defence in case of war. Hence

a king who promotes such forests over-reaches his rival (VII. 12). A village with a forest and a river in the border appears as a covetable gift also in the Mahābhārata (*pratyāsanna-vanodakam*, VIII. 38).¹ On the one hand, the river and the forest act as natural defences. On the other they help irrigation, conserve moisture and humidity and supply food-stuff and other materials. The forest has thus a double utility ; and to the author of the Arthaśāstra the economic objective of forest conservancy is not secondary but only co-ordinate to the military and strategical view-point.

Forest products (available in the *dravyavana*) are divided into several groups (*varga*) : strong timber (*sāra-dāru*), bamboo type (*venu*), of creeper class (*vallī*), fibrous plants (*valka*), plants yielding rope-making material (*rajjubhanda*), plants yielding leaves for writing material, plants yielding flowers productive of dyes, group of medical herbs (*ausadhavarga*),

¹ Cf. *satinakatthodakam* in Pali literature which perhaps conveys the same sense.

poisonous drugs and fruits (*visavarga*). A catalogue of flora is incorporated under each heading. Animal produce, minerals, charcoal, bran, ashes, menageries of beasts, fire-wood¹ and fodder (*kāṣṭhatrṇa* may also mean wattle and thatch, i.e., building material) also find enumeration (II. 17). With a view to procuring these varieties of forest produce one or several forests shall be specially reserved (II. 2). “The superintendent of forest produce (*kupyādhyakṣa*)² shall collect timber and other products of forests by employing those who guard productive forests (*dravyavanapālaiḥ*). He shall not only start productive works in forests but also fix adequate fines and compensations to be levied from those who cause any damage to productive forests except in calamities” (II. 17).

The pursuit of the Arthaśāstra's ideal would lead gradually to the conversion of forests—which were no man's property—into state monopolies. But this was attended with serious difficulties and the state lacked sufficient resource to master them. The aboriginal fowlers and hunters, who had no land to cultivate and no arts to pursue, had the forest as the source of their living.³ The forest was also infested and sometimes practically dominated by robber-bands of whom the Jātaka narratives are so full. The civil authority was far from competent to deal with these freebooters and ensure security to caravans and travellers, not to speak of dispossessing them of their sylvan haunts (Jāt. I. 437). The very name of the redoubtable Angulimāla made the Magadha king—the conqueror of Kāśī and Vaiśālī—tremble in fear even in the presence of Buddha.

¹ In the Jātaka stories town and village folk are often seen gathering firewood from adjacent forests.

² In a Pallava grant of Śivaskandavarman there is reference to forest officers (*ārañādhikata*) Ep. In. I. 1.

³ A forester (*vanacaraka*) collects wares produced in forest (*araññe upajjanaka-bhāṇḍam ādāya*) and disposes in the city. Jāt. III. 150.

CHAPTER VII

AGRICULTURAL PRODUCTS

Fertility of the soil. The cereals. Single, double or triple harvest. Fruits. Vegetables. Sugarcane. Fibrous crops. Miscellaneous.

The Greek writers burst into exuberant praise of the fertility of Indian soil¹ and favourable climatic condition and river-system while describing the multiple agricultural products of the land.

Greek testimony : fertility, food crops.

"In addition to cereals there grows throughout India much millet.....and much pulse of different sorts, and rice also, and what is called 'bosporum,' as well as many other plants useful for food, of which most grow spontaneously. The soil yields, moreover, not a few other edible products fit for the subsistence of animals, about which it would be tedious to write.....Since there is a double rainfall in the course of each year, one in the winter season, when the sowing of wheat takes place as in other countries, and the second at the time of the summer solstice which is the proper season for sowing rice and 'bosporum' as well as sesamum and millet—the inhabitants of India almost always gather in two harvests annually.....The fruits, moreover, of spontaneous growth, and the esculent roots which grow in marshy places and are of varied sweetness afford abundant sustenance for man. The fact is, almost all the plains in the country have a moisture which is alike genial whether it is derived from the rivers, or from the rains of the summer season which

¹ Some of them made an exception of the plains, i.e., of Sind. The Greek encomium applies best to the Punjab valley and the Ganges doab.

are wont to fall every year at a stated period with surprising regularity" (Diod. II. 36).

The record of Greek writers is substantially corroborated by the testimony of indigenous works. Rice (*sāli*) was

Cereals. the staple food of the people and accordingly it was the chief of agricultural

products (Str., XV. i. 53 f.; Pliny, XVIII. 13; Mil., p. 182 f.). A large variety of the grain is met with. The *kurumbhaka* is a sort of pedigree rice fit for king's fare (Mil. p. 251), and so also is the *kumudabhaṇḍikā* which is grown in Aparānta in one month (p. 292). Among the commoner and coarser varieties are found the *kaṅgu* (Mil., p. 267), red rice (*rattasāli*, Jāt., V. 37), *kalama* (J. S., II, p. 374), *kodrava* and *pulaka* which like garlic and onion cannot be offered in the śrāddhas (Mbh., XIII. 91, 38) and *sāmāka*, *nīvāra*, *cīnaka* and *taṇḍula* (Jāt., III. 142; V. 405; *syāmā* in Mbh., XII. 271, 4). Of the other food crops wheat (*godhūma*) and barley (*yava*) were the commonest. Pulses of the bean or phaseolus group were widely grown, e.g., *mugga*, *māsa*, *varaka* (Mil., p. 267), *kalāya* (Sut., III. 10; Arth., II. 24; Mbh., XIII. 111, 71), etc. There were different species like *khuddakarāja*, *mahārāja*, etc., under each head (Jāt., V. 37). Other kinds of pulse grown were *caṇa* (oat), *masura* (lentil), *śaivyā* (millet?) and *priyaṅgu* (panic. Arth., II. 24). The different kinds of oil-seeds cultivated for oil-extraction or sauce were sesamum (*tila*), mustard (*sarṣapa*), linseed (*atasi*)—in order of generality, besides the castor oil seed which grew without care. A variety of other food crops are named which remain unidentified (*nispāva*, *ālisanda*, *elamiccha*. J. S., II, p. 374).

The Greek writers also affirm that India has a double rainfall and the Indians generally gather two harvests.

Sowings and harvests. Megasthenes witnesses the sowing of wheat in early winter rains and of rice, 'bosporum,' sesamum and millet in the summer solstice

(Diod. II, 36). Eratosthenes adds further to the winter crops, *viz.*, "wheat, barley, pulse and other esculent fruits unknown to us" (*cf.* Str., XV. i. 13).¹ The Arthaśāstra evinces not only thorough acquaintance with these two harvests (II. 24; V. 2) but even with a third. A king is instructed to march against his enemy in Mārgaśīrṣa (January) in order to destroy his rainy crops and autumnal handfuls (*vāssikam cāsyam haimanam ca muṣṭim*² upahantum), in Caitra (March) to destroy autumnal crops and vernal handfuls (*vāsantikam ca muṣṭim*), and in Jyeṣṭhamūla (June) to kill vernal crops and rainy season handfuls (IX. 1). Thus there were three crops—one sown in rainy season and garnered before Māgha, another sown in autumn and garnered before Caitra and a third sown in spring and stored by Jyaiṣṭha.³ Elsewhere the Arthaśāstra catalogues the crops of different seasons. Paddy, *kodruva*, sesamum, panic, *dāraka* and *varaka* are sown in the first season (*pūrvavāpāḥ*), *mudga*, *māsa* and *śaivya* are sown in the second season (*madhyavāpāḥ*), *kusumbha*, lentil, *kuluttha*, barley, wheat, *kalāya*, linseed and mustard are sown in the last season (*paścādvāpāḥ*, II. 24).⁴ The Milinda

¹ In a descriptive passage of the Rāmāyaṇa *sāli*, *godhūma* and *yava* are seen waiting for harvest with the advent of winter. (III. 16, 16 f.) But wheat and barley are winter or *rabi* crops sown in October and gathered at the end of May. Ploughing in autumn is seen in Sn. III, 155.

² *Muṣṭim*.—probably the handful of seed grains just sown and sprouting in the field. *Sasyam* must be the crops reaped and garnered.

³ Cf. Barley "ripened in summer being sown in winter, rice ripened in autumn being sown in the rains, while beans and sesamum ripened in winter and the cool season." Tait. Sam., VII. 2.10.2.

⁴ The *pūrvavāpāḥ* and the *paścādvāpāḥ* of the Arthaśāstra agree with our *kharif* and *rabi* crops respectively. Seasonally the *kharif* is the *vāssikam* and the *rabi* is the *haimanam* of the list in Bk. IX, Ch. 1.

It is stated in the Śāntiparva that during the idealised reign of Pṛithu, 17 kinds of crops were grown for the *yakṣas*, *rākṣasas* and *nāgas* (59. 124). It may be noted that the list of the Arthaśāstra also just amounts to 17 varieties of cereals. The Br̥hadāraṇyaka Upaniṣad which goes back much earlier enumerates only 10 varieties of cultivated (*grāmya*) grains, VI. 3. 18.

speaks as well of a third monsoon (*pāvussako*) besides the regular rains of late summer and early winter (p. 114). The three monsoons of course did not uniformly visit every part of the country each year; and whether a locality grew one or two or three crops depended on rainfall, climatic conditions and character of the soil.

In many places the food crops as well as edible fruits and vegetables grew spontaneously without tillage. To the Greek observers these phenomena seemed strange. The description of the forest scenery in the Epics (*Rām.* III. 16. 16 f.; *Mbh.* III. 157. 44 ff., IX. 37. 58 ff.) and the *Jātakas* (V. 37 f., 405) frequently go at length over the crops and fruits growing in wild areas without human labour.

The forests yielded a large variety of edible fruits—

Fruits. mango, pomegranate, jack, banana, date, *vilva*, *kapittha*, rose-apple, jujube, mascot,

cocoanut, palm,—these being the commonest and best. Vines, dates and palms were specially grown in the Punjab and the North-West Frontiers. *Pāṇini* speaks of Kapisā as the premier vine-growing district of India (also *Str. XV.* i.8). Plantains as big as elephant's tusks and jack-fruits as big as water-jars are hyperboles to impress the abnormal growth of the fruits. Many of the arboreal products were unknown to the Greeks as they confessed. It is equally difficult for us to identify the various names found in descriptive texts and some of the fruits enumerated may have now gone into extinction (*Mbh.* III. 157. 44 ff.; IX. 37. 58-61; *Jāt.* V. 405, VI. 527 f.; *Āyāramgasutta* II. i. 8. 1).

Cultivation of vegetables was a pursuit apart from the growing of cereals. "The esculent roots

Green crops. which grow in marshy places and are of varied sweetness," belong to this category. In a forest scene, convolvules, cucumber, pumpkin, gourd and other creepers are found in a luxuriant tangle (*tipusa-elāluka-lābukakumbhaṇḍa vallivanāni*, *Jāt.* V. 37). These green crops were

gathered by villagers from the forests and disposed of in the market-place (I. 412). Sometimes these were grown with care. Bodhisatta once earned his living as a kitchen-gardener by growing pot-herbs, pumpkins, gourds, cucumbers and other vegetables (I. 312). A false ascetic similarly cultivated vegetables, pot-herbs and runners in a king's park and vended them to dealers (IV. 445). Between the town and the countryside the green-grocers (*pannikam*, *harita-pannikam*) had a good volume of business (II. 180, IV. 445; Gy. X. 10. 4; Baudh. III. 2. 5f).

Cultivation of sugar-cane and the growth of sugar-industry was a notable feature of Indian Sugar-cane. economy. Diodorus is struck by the great

heat and abundant moisture which combine to "ripen the roots which grow in the marshes and especially those of the tall reeds" (II. 36). These "tall reeds" were probably grown in the rich alluvial lands, e.g., in the Ganges Doab where Arrian locates the river Oxymagis or Ikṣumatī which finds mention also in the Rāmāyaṇa (I. 70.8).¹ A grove of sugar-cane of the size of areca-nut tree (*pūga-rukkhappamāṇam ucchuvanam*) occurs in the forest scene of the Jātakas (V. 37).

Among fibrous crops the chief was cotton—"the trees in Fibrous crops. which wool grows" (Eratosthenes) of which reference in the Jātakas is most common.

It was richly grown as now in Surāṣṭra or Kathiawad (Peri. 41). Herodotus describes it as a wool, better than that of sheep, the fruit of trees growing wild in India. Jute and silk of different varieties were also cultivated with care the former being confined mainly to Bengal as now. From about the dawn of the Christian era the latter had a powerful competitor in Chinese fabrics. The growth of flax (*khomam*)

¹ The Utd. Provs. are still the foremost cane-producing province in India. Statistical returns for 1903-4 show 1,700 sq. miles as against 1,000 in Bengal and 500 in the Punjab. Imperial Gazetteer, Vol. III. p. 39.

and hemp (*sāṇam*) was also widely known (Dn. XXIII. 29; Mbh. XII. 86. 14; Str. XV. i. 13). Pliny attributes to India several edible spices and plant perfumes—spikenard, cinnamon, pepper, ginger, myrrh, etc. (XII. 7.)—we may add, sandal and others.¹ Narcotic drugs like opium, tobacco, etc., and tea and coffee are not found. The main forest products, besides fruits and crops and vegetables “of spontaneous growth,” were gums, resins (*sarjjarasam*), drugs, dyes, lac, tumeric, cutch and myrobolans (*āmalaka*).² The cultivation of lac was particularly wide. Applied in varied industries, it provided maintenance for a large section of urban and rural population.

According to the Arthaśāstra sea-beaches and river-banks
 Vegetables and (lands beaten by the foam,—*phena-ghātah*)
 sowing grounds. are suitable for growing creeper-yields
 (*valliphalam*, *i.e.*, gourd, pumpkin, etc.), moist-land (*parivā-
 hantah*) for long pepper, grapes and sugar-cane (*pippali-
 mṛdvikā-ikṣuṇām*), the vicinity of wells for vegetables and
 roots (*kūpa-paryyantah* *sākamūlānām*), low grounds (*hariṇī-
 paryyantah*—the commentary explains as the dried bottom of
 pools) for green crops (*haritakānām*). The marginal
 furrows between rows of crops (*pālyolapānām*) are to be
 utilised for growing a variety of plants and herbs of
 perfumery, *materia medica*, etc. The manures known
 to the Arthaśāstra are dung and bones of cows, minute
 fishes and milk of *snuhi* (*Euphorbia Antiquorum*, II. 24).

Rotation of crops was known from very early times, by fallowing (Rv. VIII. 91. 5f.) and by sowing different crops alternately (Tait. Sam. V. i. 7.8) so that the soil is not impoverished (Yuktikalpataru, 41 f.).

¹ The location of these products and traffic upon them are treated in Bk. II. Ch. IV.

² See *supra*, Ch. VI.

CHAPTER VIII

FAMINE AND IRRIGATION

Megasthenes on famine. Growth of famine. From prayer to action.

Preventive measures. Drought and flood,—irrigation. Double harvest. Wholesome laws of war. Live pests and their remedies. Blights.

Ameliorative measures. Agricultural loans, relief-works, famine insurance fund. King's responsibility. People's responsibility.

Comparison of ancient and modern famine problems.

Diodorus, on the authority of Megasthenes describes India
Megasthenes on famine. as a land of perennial plenty of which the secret lay in its admirable irrigation and river-system, a double rainfall, natural fertility of the soil and wholesome war-practices. "It is accordingly affirmed that famine has never visited India and that there has never been a general scarcity of the supply of nourishing food" (II. 36).

Without doubt the assertion is too categorical. It would now be unnecessary labour to call piles of evidence to run it down. Instead of taking the statement itself too literally, the sociologist and historian may turn with profit to the causes for plenty adduced by the foreign observer. Examined in the light of these and checked by the cumulative evidence of indigenous literature it boils down to the facts that in the last quarter of the 4th century B.C. there was no famine in Magadha worth the name¹ and that famine had not yet

¹ Reference has been made by a scholar to a Jaina Inscription in Sravasti Belagola in Mysore which records a tradition that in the time of Candragupta Maurya a Jaina saint prophesied a 12 year calamity or famine in Ujjaini and that Candragupta in dismay abdicated and followed the saint (M. H. Gopal : *op. cit.*). Before giving credence to this piece of evidence, three points should be noted; (1) as pointed out by Fleet, 'vaishamya' should better be rendered as 'difficulty' than 'famine' (Ep. In. IV. 2),

grown into a major agrarian problem and its rigours did not approximate to contemporary conditions of Greece far less to existing conditions of India.

The earliest famine cry echoed in the *Rg-veda* reflects a patriarchal society with primitive methods of irrigation afflicted by periodical droughts but with an abundant reserve of flora and fauna to fall back upon. Instances furnished by the oldest Buddhist records are apparently parochial and of short duration. Famines (*dubbhikkha*) are referred to associated with cities and a 'heavy mortality' pithily appended, but the accounts are rare and brief. Famine-stricken people are pictured as taking the flesh of elephant, horse, dog and snake. (Mv. VI. 23. 10 ff.), animals which appear among the normal diet of other racial groups. Elsewhere the people of *Vesāli* are seen praying to the *bhūtas* for relief against drought and plague (Sut. II. i) and the description of the havoc occurs only in the commentator's introduction of centuries later. A common test of famine affliction is that people fed not the whole congregation as was customary but only select *bhik-khus* by ticket (Cy. VI. 21. 1). Etymologically the word 'dubbhikkha' (when even alms are scarce) does not connote heavy mortality and the early Pali accounts are a far cry from the harrowing details of later literature.

The Jātakas show how famine stories were finding place in popular imagination and folk-lore. "For In the Jātakas. the space of three years he (Sakka) stopped rain from falling in the kingdom of Kāsi and the country became, as it were, scorched up, and no crops came to perfection" (V. 193 f.). At Kosala once there was a drought

(2) it is at least 800 years later than the time it professes to record, (3) it is coloured by priestly motive and the duration of the calamity,—recalling the conventional Epic figure, suggests it to have been a legendary version of a minor drought, if it is at all to be credited with any degree of accuracy.

so that crops withered and water gave out in tank and pool and "fishes and tortoises buried themselves in the mud" (I. 381). Elsewhere the people of Kalinga are said to have taken to robbery under the stress of famine (VI. 487). Another Kāsi famine was so severe that even crows had to quit the land for men had no food to spare for them (II. 149). The intensity and proportions assumed may also be gauged from the reference that pestilence may follow in its wake (II. 367).

A potential stage in the spread and intensification of famine was the destruction of the primeval forests, the great natural reservoirs of rain which "kept the fruit of the summer's rain till winter, while the light winter rains were treasured there in turn till the June monsoon came again."¹ The Epics offer glimpse of extensive schemes at work of colonisation and deforestation (Rām. II. 80; Mbh. I. 230 ff., IX. 41. 14, X. 10.5) which in course of their progress extended the rigour, recurrence and area of scarcity to make it a calamity of first magnitude.

The *ākhyāna* portions of the Epics which generally represent later strata on the original themes show acquaintance with this problem in an aggravated form. A famine compelled the sage Viśvāmitra to abandon the land and his wife who was maintained by Mātanga then a hunter (Mbh. I. 71. 31). Droughts continued for many years at a stretch (*vahuvārṣikī*) extending up to ten or twelve, have found indelible impression in public memory. The Rāmāyaṇa alludes to a hermitess who created fruits and roots and caused the Jāhnavī to flow when the earth was parched by a ten-year drought (*daśavarṣān-yanāvr̥styā-dagdhe loke nirantaram*, II. 117. 9 f.). The Kuru famine in Samvarāṇa's reign was the result of a twelve

¹ Washburn Hopkins, *op. cit.*, p. 281.

years' drought (*anāvṛṣṭi-rdvādaśavāṛṣikī*)¹ to which even animals and trees had to succumb and the capital looked like a city of ghosts (Mbh. I. 175. 38-46). Another twelve years' drought in the regions about river Sarasvatī caused great affliction to the *r̄ṣis* (IX. 51. 22 ff.). But the most doleful description of a twelve years' drought in the Epics runs as follows :

Not even dew-drops could be seen what to speak of clouds. Lakes, wells, and springs were dried up. The assemblies and charity foundations suspended their business. Sacrifices were in abeyance. Agriculture and cattle-rearing were given up. Markets and shops were abandoned. Stakes for binding sacrificial animals disappeared. Festivals died out. Everywhere heaps of bones were seen and cries of creatures heard. The cities were depopulated, hamlets burnt down. People fled from fear of one another or of robbers, weapons and kings. Places of worships were deserted. The aged were turned out of their houses. Kine, goats, sheep and buffaloes fought and died in large numbers. The Brāhmaṇas died without protection. Herbs and plants withered. The earth looked like trees in a crematorium. In that dreadful age when righteousness was at an end, men bereft of senses in hunger began to eat one another (vabhramuh kṣudhitā martyāḥ khādamānāḥ parasparam,— XII. 141. 13 ff.).²

These figures and depictions, legendary as they are, conjure up protracted droughts and famines afflicting backward areas³ and taking a heavy toll of life. The good old

¹ Seeing the context as it is, it is pedantic nonsense to suggest for the phrase the meaning "the drought that comes once in every twelve years."

² The concluding phrase may mean that the people took to plunder and rapine on the goods of others and not actually to cannibalism. Moreover as it is a 12 years' drought and at the transition from *tretā* to *dvāpar* a good margin may be left for priestly padagogy. There is a similar though less elaborate picture of a *vahuvāṛṣikī* drought coming as nemesis of *kaliyuga* and prelude to the cosmic deluge (III. 187. 65ff.).

³ Like the arid plains of Sind and Rajputana. From Epic and Jātakas evidences, the Kurū land appears as notorious for famine.

days when there was no fear of hunger (*kṣudhābhaya*), when rains showered in due time and the produce was juicy (*kālavarsī ca parjanyah śasyāni rasavanti ca*) had gone for ever and remained only to be recalled with mournful yearning (Mbh. I. 68. 8-10).

The Arthaśāstra catalogues fire, flood, pestilence, famine and *maraka* as providential calamities (*daivapīḍanam*, VIII. 4). It may also be observed that Kauṭilya's teacher who spoke from experience of an earlier regime

In the Arthaśāstra and the Dharmasāstras. thought pestilence as a graver catastrophe than famine, and he is controverted by his illustrious pupil to the effect that the evils of pestilence are localised and remediable, of famine countrywide (*sarvadeśapīḍanam*) and costly to life (*prāṇināmajīvanāy 'eti*). The legal injunction as well on the inviolability of *strīdhana* is relaxed in case of famine when the husband may consume it without obligation to refund (III. 2; Yāj. II. 143). Manu slackens the caste rules on food, etc., during famine and allows inferior callings to be pursued by higher orders (X. 97). In the law-codes famine or hunger became one of the recognised causes of slavery.

Thus with the clearance of forests, increase of population and rise of socio-economic partitions, famine became a

From prayer to action. major agrarian problem before the dawn of the Christian era: and princes and peoples turned after bitter travail from

fast and prayer to mechanical devices against drought and flood. Though irrigation is not unknown in the Rg-veda (X. 68. 1; 99. 4; 25; 93. 13), its hymns dilate less on plucky and gallant struggle with nature than on prayers and magic directed to Indra the raingiver (III. 8; VIII. 118. 55; X. 42). Coming down to the Atharvan poet we find him also praying that the sun, lightning and excessive rain may not ruin his crop and devise charms for the same purpose (VII. 11, IV. 15, VI. 128). Passing on to the

earliest Buddhist literature, a gradual change in outlook is marked,—when states and peoples awaken to action. By careful diagnosis of the causes of famines and injury to crops, they begin to explore specifics and apply preventive and remedial measures instead of trusting over-much on the humour of the gods.

The typical herald of famine in those days was drought, and its only redress is planned irrigation. In Buddha's time the *khettas* of Magadha were intersected by a network of canals and ridges,—

Irrigation : in Pali
works and Epics.

rectangular and curvilinear which marked the boundaries of arable plots¹ and which resembled a patch-work robe (*civara*) such as is prescribed by Buddha as a pattern for the order being the least covetable thing (Mv. VIII. 12. 1-2). Watering projects were undertaken by specialists who "conducted the water as they pleased" (*udakam hi nayanti nettikā*, Dhp. 80, 145; Therag. 19, 877).² The operations were designed to regulate the inflow and outflow of water in the *khettas* after the sowing (*udakan atinetabbam.....atinetvā ninnetabbam*, Cv. VII. 1. 2, cf. V. 17. 2). The canals and tanks were apparently dug by co-operative effort and for co-operative irrigation (Jāt. I. 199 f, 336; V. 412). In the Epics is manifest the sense of royal responsibility in the matter. "Are large and swelling lakes excavated all over thy kingdom at proper intervals without agriculture being in thy realm entirely

¹ Literally—"divided piecemeal (*taccibandham*—Buddhaghosa's note 'catura-ssakellarabaddham') is insufficient. A raywise division would not help distribution of water) and in rows (*palibandham*—Buddhaghosa has 'āyāmato ca vittharato ca dīgha mariyādabandham') and by external ridges (*mariyabandham*—Buddhaghosa gives 'anatarantarāya mariyādāya mariyādabandham') and by cross boundaries (*singhātakabandham*—Buddhaghosa explains 'mariyādam vinivijjhitvā gataithāne singhātakabandham'. *Catukkasanthānanti attho*')".

² "The *nettikās*, to judge from the commentary and from the general purport of the verse, are not simply water-carriers but builders of canals and aqueducts who force the water to go where it would not go by itself"—Maxmüller's note in the *Dhammapada*, S. B. E. series.

dependent on the showers of heaven?" So says Nārada to Yudbiṣṭhira in his discourse on administrative principles (kaccid rāṣṭre tatāgāni pūrṇāni ca vṛhantī ca : bhagaśo vini-viṣṭāni na kṛṣi-rdevamātṛkā, Mbh. II. 5.77.). Rāma eulogises the land of Kośala as *adevamātṛkāḥ*, i.e., relying on irrigation and not on rainfall (Rām. II. 100. 45) and the Arthaśāstra uses the same epithet to describe the qualities of a good country (VI. 1). The advance made in irrigation may be imagined from the anecdote that when a teacher sent his pupil to stop a breach in the water-course of a certain field, the latter had to lie down to stop the flood and prevent vital injury to the crops (Mbh. I. 3). The position is confirmed by a parable the implication of which is that guards were employed at the vital spots of embankments, the rupture whereof would cause a great flood and damage.¹

But the Jātakas and the Epics do not shed off the belief in the dispensation of Sakka or Indra who held the key to their garner from heaven.

Lawbooks of post-Christian compilation encourage irrigation enterprises by kings and peoples with the lure of divine reward (Viś. XCI. 1 f, 9; Vāś. XVII. 8; cf. Vṛ. XIV. 23). The Arthaśāstra marks the evolution of a completely economic outlook. Except for a formal chanting of Vedic mantras (II. 24), the author concentrates on various precautionary measures among which the largest attention is given to irrigation. In Buddha's time irrigation contrivances hardly excelled the old Vedic mechanisms ; water was drawn by means of the lever,² the bullock-team³ or the wheel and axle⁴ (Cv. V. 16. 2). The Arthaśāstra evinces a

¹ The king should be vigilant at danger-gates as at the dam of a large water-work—āpaddāresu yuktaḥ syaj-jalaprasravanesviva, Mbh. XII. 120. 8.

² *tulūṇi*.

³ The reading differs between 'karakaṭaka,' 'karakaṭanka' and 'karakadaka.' Buddhaghosa explains—'vuccati goṇe vā yojetvā hatthehi vā gahetvā dīgha varattādīhi ākāḍḍhanayantam.'

⁴ *Cakharvattakanī*, Buddhaghosa's note—'arshattaghaṭiyantam' is not clear.

mature engineering skill. Great caution and experience are required of the cultivator in order to use properly its irrigation projects (II. 9). The offender who breaks the dam of a tank full of water (*udakadhāranam setum bhindataḥ*) shall be drowned in that very tank (IV. 11, Manu, IX. 279). Its irrigation methods by means of mechanical contrivances and air power are corroborated in a later Pallava plate¹ and in the *Sukranītisāra* (II. 320-24). The costly and perfected water-works necessitated the levy of a graduated water-rate (*udakabhāga*) and the testimony of the *Sukranīti* is concurrent (IV. ii. 227-29). But if such works are dug by peoples themselves, nothing should be charged until they realise profit twice the expenditure (Arth. III. 9; *Suk.* IV. ii. 242-44). This provision laid down with slight variation by two outstanding treatises on political economy separated by at least nine hundred years is a most eloquent testimony to tradition and its influence on sociological development in ancient India.

Later epigraphic records supply copious illustrations of magnificient state enterprises. Instances
In inscriptions.

in early inscriptions are few and far between. Still we do not altogether lack examples of private initiative for sinking wells and reservoirs under royal encouragement. The Ara inscription of Kaniṣka II alludes to "a well dug by Dasafota...for the welfare of all beings" on which the king threw a lac as a religious gift. An Andhra inscription of Sri Pulumāyi's reign (identified by Sukthankar with Pulumāyi II) speaks of a well sunk by a *gahapatika* (Ep. In. XIV. 7, 9). As a protagonist of irrigation schemes, the Mauryas do not stand on Aśoka's Edicts alone. They took a vigorous interest in the irrigation of the country-side. Megasthenes enumerates a class of officers distinguished from those entrusted with the administration of

¹ Ep. In. V. 8.

the city and of the military, who “superintend the rivers, measure the land, as is done in Egypt, and inspect the sluices by which water is let out from the main canals into their branches, so that everyone may have an equal supply of it” (Str. XV. i. 50). The Junagadh Rock Inscription of Rudradāman states how the Sudarśana lake excavated by the governor of Candragupta Maurya, restored and adorned with conduits by Asoka’s governor, had subsequently an enormous breach and was dried up; and “when the people in their despair of having the dam rebuilt were loudly lamenting” (punah setubandha-nairāsyat hāhabhutasu prajāsu), the Saka prince undertook the reconstruction in the teeth of ministerial opposition with a large outlay of capital and furnished the lake with a “natural dam, well-planned conduits, drains, and means to guard against foul matter.”¹ The dimensions of the dam (420 cubits \times 420 cubits \times 75 cubits) give an idea of the vastness of the reservoir, and this was constructed by the Mauryas even in an outlying province. King Khāravela of Kalinga claims to have similarly strengthened the embankments of springs and lakes with a large expense,—in the famous inscription of Hathigumpha. And Rudradāman was not the solitary instance of his line in magnificent irrigation enterprises. A Sanchi inscription of the 3rd century A.D. records the excavation of a well by a Saka chief (mahādaṇḍanāyaka) of perennial water-supply for all (salilah sarvādhigamyah sadā); and an inscription of the 2nd century in Kathiawad says that a general (senāpati) of the time of the Kṣatrapa Rudrasimha caused a well to be dug and embanked in the village of Rasopadra for the welfare and comfort of all living beings (sarva-satvānām hita sukhārtham).²

¹ Ep. In. VIII. 6. Cf. Cv. V, 17.2 for similar contrivances.

² Ep. In. XVI. 16 f.

The irrigation schemes provided not only against drought
Irrigation and flood. but also against flood and excessive rainfall.

Though flood figures in Vedic prayers, among the *daivapīḍanams* of the Arthaśāstra and among the *itayah* of the Mahābhārata (V. 63.17), as enumerated in the Purāṇas¹ as forerunner of famine, it is overshadowed by drought in all sorts of literature. In those days, when the river system had probably its natural flow and was not silted up as now, flood did not pay an annual visit with the monsoon. In the Jātakas there is a solitary case of grains being washed away in the rainy season but obviously the *khettas* were not flooded, for “the corns had just sprouted” (*sassānam gabbhagahaṇakālō jāto*) and the villagers expected a fair harvest if they could hold on for two months (II. 135).²

In the introduction to the Mahāsupina Jātaka is narrated how at the sign of desired rain “men shall go forth to bank up the dykes with spade and basket in hand” (*purisesu kuddālapīṭakahatthesu āliṃ bandhanatthāya nikkhintesu*—I. 336). The implication is same in the Mahābhārata simile recalling the uselessness of closing the embankments after the water is let out (*gatodake setubandho*—VIII. 86.2). The Rāmāyaṇa allegorically refers to dykes releasing rain water (*pranālīva navodakam*—II. 62.10). In the Milinda the *khettas* are seen provided with sluices (*mātikā*) to bring in water and embankments (*mariyāda*) to keep the water in (P. 416). The control over inflow and outflow of water appears in the irrigation process of the Vinaya passage quoted above. It seems that the ditches cut across the embankments raised around the plots, to be fed from tanks, wells and rivers in case of drought, to let out surplus water during excessive rainfall, and in times of rain

¹ These are six calamities of husbandry, viz., drought, flood, locust, rat, bird and foreign invasion.

² Flood is referred to in Mv. III. 9. 4; Mn. 28; Mil. P. 277.

after prolonged drought the gaps in the embankments were sealed up to hold the water for the sun-burnt plots almost exactly as peasants do to-day.

But freaks of nature were not conquered by the mechanic's art. To illustrate the superiority of Providence over human effort, Kṛṣṇa cites to Arjuna the case of artificial watering schemes (āsekam) which cannot effectively counteract the havoc of drought. As a matter of fact, human ingenuity is only a mark of the precariousness of life. It develops though always beaten, with the growth of the problem which it is called upon to answer; and hence it is that the history of Kashmir between the 8th and 10th centuries simultaneously present the miraculous engineering feats of Śakuna and Suyya as well as the most harrowing tale of death from flood and famine bequeathed by our antiquity.¹

Of course the Indians gathered two harvests annually and this is not told by foreigners alone.² The Milinda even

Two harvests. speaks of a third monsoon (pāvussaka ?)

in the year besides the rainy season proper and the early winter-rains (p. 114). The Arthaśāstra recommends as a last resource for taxation the compulsory raising of a second crop by the cultivators (V. 2). After a meteorological dissertation it charts the crops in order of the quantity of rains required for each and instructs cultivation of scheduled crops with a forecast of the rains (prabhūtadakam alpodakam vā śasyam vāpavet, II. 24).

The peculiarly Indian belligerent custom which removed another prolific source of famine, in deference to which hostile parties spared husbandmen and cultivated land as

¹ Rājatarāṅgiṇī, V. 271-77.

² Diod. II, 86; Str. XV. i, 13. Cf. 'karmodakapramāṇena kedāram haimanam graiṣmikam vā śasyam sthāpavet.'—Arth. II, 24. 'pubbaṇḍa parāṇḍani ca vapantā,' Jāt. I. 389.

inviolable¹ and “neither ravage an enemy’s land with fire, nor cut down its trees,” struck the Greek visitor,—for in the Hellenic world and in every land and in every age, famine has followed in the trail of a civil war or an international war of attrition. An international law, however, depends for its observance in the last resort on the good sense and enlightened self-interest of states. And it will be too much to think that in ancient India all the princes and statesmen were farsighted enough or guided by humane principles. In fact, foreign invasion is included in the Purāṇic list among the enemies of crops and the Machiavellian author of the Arthaśāstra would not spare an enemy’s corn-fields when strategical considerations urged such a measure (IX. 1). Destruction of enemy’s crops (*vīrudhaśchedana*, *śasyaghāta*) is repeatedly enjoined also in the Sāntiparva as a maxim of *rājadharma* (59. 49; 69.38; 103.40; 120.10). But these exceptions must always be allowed in international code and the Greek testimony need not be totally dismissed solely on the score of the latter.² There are no historical instances of native forces who “devastate the land and ruin the crops of their enemies.” In the Rāmāyaṇa is related how the *vānara* host marching to Lāṅkā along the Eastern Ghats kept the cities and countryside (*janapada*) at arm’s length out of fear for Rāma’s terrible discipline (VI. 4.38). A Pāṇḍya inscription of the 9th century A.D. preserves an agreement entered into by local chieftains with the headman of a village or a group of villages, by which the former solemnly undertook when they and their retainers were fighting, to avoid inflicting any injury upon villages or their property and promised to pay compensation of 100

¹ Husbandmen are exempt from fighting and other public services. They are inviolable even in time of war; “being regarded as public benefactors are protected from all injury.” Diod. II, 40; Str. XV. i. 39-41, 46-49.

² Washburn Hopkins, *op. cit.*, p. 247.

panams for any injury to a cultivator and 500 *panams* for the destruction of every village.¹

Other factors occasionally aggravated scarcity or destroyed crops over a small area. Depredations of live pests called for serious attention. The Livepests, blights, over-population. Atharvaveda prepares spells for the extermination of vermins and insects (IV.50, 52). The Chāndogya Upaniṣad tells that locusts (*mataci*) blighted the face of the Kuru land by ruining its crops so that a sage had to move to a neighbouring country along with his wife and live on sour gruel (*kulmāsa*, I. 10. 1-3). Locusts (*śalabhāḥ*) swarming upon a corn-field appear in Epic similes (Rām. VII. 7.3 ; Mbh. VIII. 24.22). Gobhila prescribes sacrifices at molehills to the king of moles (*ākhurāja*,—Grhyasūtra, IV. 4.34). In the Arthaśāstra rats figure as a veritable nuisance for which no better remedy is devised than rearing of cats. Birds, beasts and thieves caused much annoyance and necessitated the employment of field-watches of which the Jātakas contain many examples. In one case a plot entrusted to a watchman is ravaged by parrots before his nose (IV. 277; cf. V. 336). The peasants are constantly preoccupied against the forays of deer-herds in harvest time (I. 143, 153, 154; IV. 262). The fowlers and hunters rendered a social service by the destruction of these pests and if Megasthenes' evidence is to be credited, they received in Maurya India a subsidy of grain from the king for the salutary job (Str. XV. i. 41). Corns might be destroyed by hailstorm (*aśmavr̥ṣṭi*, Rām. III. 34.39 ; karakavassam, Mil. p. 308). A corn disease called *setat̄thikā*² (blight) sometimes spoiled rich rice-fields, as another called

¹ Report on the Progress of Epigraphy in Southern India, 1914-15,—quoted in Havell's Aryan Rule in India, p. 221.

² A borer pest (*pāṇako*) which blights the head of paddy unable to get the sap, Commentary.

mañjeṭhikā exterminated sugar-canies (Cv. X. 1.6; An. IV. 279) and caused famine and mortality (*dvihitikā setatthikā salakavuttā*, Vin. III. 6.15, 87; IV. 323; An. I. 159; Sn. IV. 323; dussassam *setatthikam* *salakavuttam*, An. I. 160). Over-population may have occasionally caused shortage of food for which the Arthaśāstra prescribes reclamation and colonisation of waste lands¹ (*svadeśā-bhisyandavamanena*, II. 1); but this factor bore no analogy to the present population problem which is accentuating unemployment, starvation and want all the year round.

Proceeding from the prayers and spells of the Vedas and the fasts and moral vows of the Jātakas we discern in later literature the evolution of a

Agricultural loan.

medley of precautions and cures from a strenuous grapple with the food problem,—ranging from pettiest nostrums to the most effective relief-schemes. The passage quoted above from Nārada's admonitions continues : “ If the food or seed-grains of the agriculturists fall short, do you grant with kindness loans unto them at the rate of 1 p.c.? ”

Kaccinna bhaktam vījañca karṣakasyāvasīdati

Pratyekañca² śatam vṛddhyā dadāsyṛṇam anugraham

Mbh. II. 5. 78.

In the Arthaśāstra agricultural loan advanced by the king is called *āpamityaka* and its accounts are supervised by the Treasurer (II. 15). The king shall also distribute seeds and provisions gratuitously in famine (*vījabhaktopagraham*)³ or he may inaugurate relief works in forts and

¹ The Śāntiparva exhibits the recognition of the reclamation and fertilisation of waste land as among the highest duties of a king (Nilakanṭha explains ‘*bhūsamśkāram*’ as ‘*bhūral sampanna śasyatam*.’ 65.2).

² Variant *pādakañca*. This would make the interest 25 p.c. instead of 1 p.c. But according to the commentator, the former is the annual rate, the latter the monthly rate.

³ Cf. Jātaka IV. 132, where a king distributes food money (*bbattavetanam*) in the city “ without least neglect to any body.”

set up irrigation schemes. Doles may be given from either his own reserve fund, or from the amassed store of the rich who must be mercilessly taxed (*karṣanam*) and despoiled (*vamanam*, IV. 3). This idea of progressive taxation of higher income and expropriation of hoarded wealth in a national crisis, so curtly asserted in the *Arthaśāstra*, does not stand in isolation in Indian political economy. The administrative theory embodied in the oft-quoted dictum that the king is the devourer of the rich (Mbh. III. 2.39; Rām. I. 53. 9f; Jāt. III. 302) when applied by a judicious ruler could take no other form. This communistic doctrine, although dangerous in a rapacious or irresponsible hand, nevertheless conduced to partial equalisation of wealth and modification of hardship by distributing it over the whole society.

Loans of provision and gratuitous relief were distributed by royal, private or corporate endeavour. A fragmentary and mutilated *terra cotta* inscription found in Mahāstbān records the order of a Maurya prince to the Mahāmātra of Pundranagara directing the latter to help famine-striken *saṃvamgiyas* with loans in cash (*gaṇḍaka*) and corn (*dhānya*) which they are to repay in better days to the royal treasury.¹ The Sohgaura Plate, supposed to be an early Maurya document by K. P. Jayaswal and by Fleet records an order of the Mahāmātras of Srāvasti to the effect that certain store-houses (*kothagalāni*) at Trivenī, Mathurā, Cañcu, Modāma and Bhadra are to be opened to cultivators in seasons of distress.² In the Gahapati Jātaka, the villagers obtained an ox for loan from the *bhojaka* on condition of paying in kind from the next harvest (II. 135). In the Kalpadruma Avadāna, the rich men of Srāvasti collectively

¹ Ep. In. XXI. 14. This sense however is gathered by D. R. Bhandarkar with some diffidence. B. M. Barua draws out a completely different meaning, Indian Historical Quarterly, Vol. XX.

² Ep. In. XXII. 1.

undertook to feed the famine-stricken. The charity foundations of the pious rich, royal and private, frequently described in the Jātaka stories and the inscriptions had a pressing job for amelioration.

A healthy policy of embargo on food grains as an emergent measure is indicated by Medhātithi who cites the instance of crops during famine to illustrate Manu's rule against the exportation of articles forbidden by the state to be taken out of the country (VIII. 399). As a last resort the Arthaśāstra suggests the migration of the population *en masse* to a land of rich harvest or where water is available (IV. 3 ; VII. 4 ; XIII. 1).

The surest guarantee against famine inculcated by every shade of thought upon rulers as the first Agricultural policy : lesson of statecraft, was an enlightened famine insurance.

revenue policy. The protection that was the king's duty in return for the *śadbhāga* was not only protection of life and property, but ensuring the harvest and insuring against famine. In Rāma's administrative discourse to Bharata it is one of the basic principles of statesmanship to subsidise cultivators for their prosperity (*teśāṁ guptipanhāraiḥ kaccit te bharanam kṛtam*, Rām. II. 100. 48). In the Dīghanikāya a chaplain advises a king that the proper approach towards diminution of crime is not taxation and punishment but subsidising cattle-rearers and farmers with fodder and seed-corn (V. 11). The forts that are found in the Epics stocked with wealth and all sorts of food grains served a double purpose of defence of the realm against mortals and against gods. A passage in the Nītvākyāmr̥tam of Somadevaśūri enjoins by implication that the king should accumulate grain as a safeguard against famine (VIII. 6) and the Arthaśāstra explicitly directs the king to earmark half the store collected by him for an insurance fund against public calamities (*arddham āpadartham janapadānāṁ sthāpayet*, II. 15.).

An interesting sidelight on the prevailing mode of ventilating grievances and the idea of royal responsibility and attitude during famine is thrown by certain typical passages of

King's responsibility in famine

the Jātaka stories. When the crops fail from drought, the victims flock to the capital, gather in the palace courtyard and make a row or wait in deputation. The king appears on the balcony and is accosted for drought. He gives sympathetic hearing to the spokesmen, dismisses the hunger-marchers with assurances and observes fasts and the moral code which however do not avail. Although the stories end in inevitable anticlimax,—practising of *kuru* piety, breaking of an ascetic's virtue or a white elephant ultimately causing rainfall (II. 367ff, V. 193f, VI. 487), they testify to an exalted conception of trusteeship which was less vaunted but more observed than India's present masters. A king agrees to lend his daughter for the breaking of an ascetic's virtue and bringing rains. “Thus for the protection of his realm did he talk with his daughter even of such things as should not be uttered and she readily acceded ‘very well’.”

Evam sā dhītara saddhim akathetabbam pi rāṭṭhapari-pālanam nissāya kathesi. Sā'pi 'sādhū' 'ti sampaticchi.

The origin of the idea of king's responsibility is in the conception that rain is produced by sacrifice (*Yajñād bhavati parjanyo*, Mbh. VI. 27. 14). The king protects sacrifices, sacrifices please gods and the gods give rain (I. 41. 29f, VII. 55. 42). Hence there are no rains and no harvests in a kingdom without king (I. 105. 44; Rām. II. 67. 9) or with an absentee king (Mbh. I. 175. 38ff) or of which the king violates the code of piety (III. 110) even to the extent of delivering a refugee to a foe (V. 12. 19). It is however not always merely sacrifices and abstract piety but good administration in the concrete manifested in benevolent and non-partisan administration, protection from internal pests and foreign

foes, irrigation works and judicious revenue policy that act as safety valve against famine and its precursors (II. 13. 12, 33.5). This realistic notion is implied in the grouping of famine and pestilence with robbers who make favourite haunts of misgoverned kingdoms (VII. 95.25). At any rate the association of sovereign responsibility with public calamities had a firm and ubiquitous hold on popular mind¹ so that it was high tribute to a king's administrative ability and a token of divine favour on him to affirm that in his reign there was no famine.

Denunciation of unrighteous rule in sacred books, Brāhmaṇical and Buddhist, was no doubt a priestly fabrication intended to hold the contumacy of kings under a threat to good government. But since unjust taxation is the most notorious violation of the divine law, the theory no longer remains a clerical myth but becomes an economic fact. When Buddha prophesied famine as nemesis of unrighteous rule, he emphasised that kings would be "crushing their subjects like sugar-canies in a mill" (ucchuyante ucchuganṭhikā viya manusse pīlentā), a choice and oft-quoted imagery (Jāt. I. 339, II. 240). Instances are there of rulers who impoverished their subjects with fleecing demands. To guard against this danger, economists and law-givers of all schools and denominations standardised the land revenue at $\frac{1}{8}$ of the produce (or profit?) to be maintained with some elasticity considering the taxable capacity of the tenants and the needs of the state. The author of the Arthaśāstra in his unscrupulous search for means to fill the royal exchequer, does not forget to warn emphatically against collecting a tax which is not ripe, *i.e.*, which shall spoil the very source (V. 2), and to prescribe remissions (parihāram) of cultivators' taxes in emergency (II. 1). This legal injunction was

¹ A much later Tamil piece detailing the onerous obligations of sovereignty, proclaims that the king "is to blame if the rains fail." See S. Krishnaswami Aiyengar, Ancient India, p. 69.

meant to be observed during drought (Mbh. XIII. 61.25). The fact that they paid only a tax on produce or profit and no rent on land eliminated a fruitful source of oppression and enabled them to tide over a crisis unencumbered by an additional burden from above.

If the king had to maintain a high standard of personal conduct to keep off famine, that does not mean that the people had a free licence. Peoples' responsibility. The gods might suspend the rains owing to the unrighteousness of the people (An. I. 160; II. 75) or for the negligence of the Brāhmaṇical rites (Ch. Dhp. p. 111). On the obverse pious men may call a downpour from the sky by their observances (Mil. p. 120). Famine could never visit Śākadvīpa because people were virtuous there (Mbh. VI. 11. 10f). The piety of Arundhatī dispelled a terrible twelve years' drought (IX. 48. 40).

Thus the ancients suffered under and fought gamely Ancient and modern against the arch-peril of food-crops. famine.

Amidst the diversity of time and local conditions, famine conditions were broadly the same due to the somewhat uniform land revenue system and administrative maxims, and to the absence of communication, large scale industrialisation and overpopulation. The frequency and rigour of famine, despite the harrowing details with which they are at times enlivened—these must be read with proper discount for popular and poetical love for magnifying memorable incidents,—differed, materially from modern conditions.¹ The severe outbreaks of scarcity in ancient

¹ For opposite view see Washburn Hopkins, *op. cit.*

After drawing up a laborious list of famines from ancient literature beginning from Vedic texts, a scholar derives that 'famines were far more frequent and destructive in former centuries than at present' (p. 242). To appraise the *dvādaśavārṣikī* and *rāhuvarṣikī* famines of the Epics at their face value and give them the credit of sober historical narratives is simply preposterous. It might be noted that even 100 years' droughts figure in Indian literature (*Bhāgavatam*, 7. 28.22). See P. N. Ramaswami, Early History of Indian Famines, in *Indian Antiquary*, Vol. LII.

times were incorporated as object lesson in tradition and folklore because they were exemplary visitations from Heaven coming at long intervals to punish the accumulated vice of princes and peoples; while even fifty years from now, it was ascertained by examination extending over 110 years that an extreme famine—be it noted, of such mortality as was perhaps totally unknown in ancient India,—in one Indian province or locality may be expected once in 50 years and that drought, followed by acute distress, comes by routine once in 11 or 12 years.¹ As for the alertness of state and people for redress the pet phrase of ‘oriental stoicism’ is more appropriate to modern times than to remote antiquity. Excavation of irrigation canals under corporate initiative like the ‘Anderson Khāl’ of Brahmanbaria was not unique but habitual affair. The ideas of remission of taxes and advance of loans which did not dawn until 1880 to the Indian Government,² thrrove with Indo-Aryan economists earlier than the Christian era; and so did the scheme of famine insurance fund which was taken up by our rulers as late as about the close of the last century,³ and then left again as a dead letter.

So in a way, Megasthenes stands vindicated against the charge of mendacity. Famine as we know it, was unknown to our early ancestors, famine nurtured in our country by over-assessment of holdings, costly administration, over-population, insufficient irrigation work and the vagaries of a river system which stand in need of control by means of canals and embankments.⁴ But even these do not account for the dislocation of the old agrarian system and the ruin of the cultivator. Thanks to the modern tenancy legislations

¹ Madras Administration Report, 1885. Vol. II, pp. 470 f.

² Report of Indian Famine Commission, 1880.

³ Report of Indian Famine Commission, 1900.

⁴ R. C. Dutta : Famine and Land Assessment in India.

the ryot has lost three protective girdles which he enjoyed in the past,—the laws and customs that prevented alienation of holdings ; assessment at a share of the produce or profit¹ of cultivation whether in crops or cash which implies *ipso facto* no crop no tax ; and limitations to usury imposed by tradition and sacred law. Obliged to pay the rent and fixed tax in money whatever be the state of harvest and price of crops he is easily drawn into the coils of the money-lender and sells or mortgages his land whenever the crops fail. This process has led to progressive pauperisation of the ryot, sucked his staying power and is rapidly reducing him to a serf bound down for wage or share of produce in his own patrimony alienated to his landlord or moneylender and leaves him under the grip of perennial famine.

¹ See *infra.* pp. 119 ff.

CHAPTER IX

LAND REVENUE AND ALLIED CHARGES

The social contract. Canons of taxation,—certainty; convenience.

King's share—*bhāga*. Of produce or of profit? Cadastral survey. Assessment in cash or in grains?

Additional revenues—surtaxes, *kara*, corvée, benevolences. Royal domains. Cattle-tax. Royalties. Miscellaneous imposts. Revenue-free lands. Transfer of revenue. Jāigir system? Remission and reduction of revenue.

Weaknesses of the revenue system. Emergency laws. Exemption to Brāhmaṇas.

Working of the revenue system. Moderate and oppressive taxation.

Rôle of the state in rural economy. The budget. Heads of expenditure—public works, poor law, famine relief, law and order, sacrifices, bounties. Divergence between theory and practice in the revenue system.

The origin of land revenue is as old as the origin of state. Even in the early Vedic period, the Indo-Aryan polity was sufficiently organised to collect regular taxes

The social contract called *bali* which apparently consisted of contributions from agricultural produce and from the stock of cattle paid by the villagers at certain specific rates.¹ In post-Vedic works we have for the first time classified lists of the sources of king's revenue together with the customary rates of each. They, moreover, approach the modern European thought in consciously formulating general rules and maxims of taxation as well as the principles of application of special taxes. The fundamental concept of taxation seen in early Dharmasūtras is that the king is entitled to a tax for the service of protection.² This theory is based upon a corresponding conception of contract between the ruler and his subjects. The theory of social contract as given in Manu and the Sāntiparva (67.23ff)

¹ Ghoshal: Hindu Revenue System, pp. 9f.

² Gaut. X. 27; I. 10. 18. 1; Vāś. I. 42; Viś. III. 28.

allows the king 1/50 of animals and metals and 1/10 of grain with the fairest maiden, military service and 1/4 of merit. Although the Arthaśāstra considerably raises the amount as is its wont—*viz.*, to 1/6 of grains and 1/10 of merchandise, certain features are common in this story of the traditional origin of kingship. First, the people submit to a voluntary or self-imposed tax, the rate being fixed by themselves. Secondly, the taxes are given to the chosen king as wages for ensuring protection and prosperity. Thirdly, the king is answerable to subjects for violating the principles of just punishments and taxes.

The law-books do not show any further evolution of public control of raising and appropriation of money. But

Canons of taxation : certainty. they provide moral sanctions. The writers on law and polity countenanced

no uncertainty in the assessment of king's dues and left no room for arbitrary collection at least in normal times. Even what seems to be most high-handed and oppressive from modern standpoint was sought to be justified by reference to authorities who defined every tax with laborious precision. Every tax-payer knows what he has to pay and no ruler can impose anything beyond only lawful taxes. Over-collection by officers is not connived at. "Whoever doubles the revenue eats into the vitality of the country" and punishment is enjoined for the traducer (Arth. II. 9; Suk. i. 617f). Kinds and assessments of taxes and appropriation of money were considered to be fixed for ever by the Divine Law violation of which was anathema and meant grave public discontent.

Thus the early Indian taxation system was not stranger to the canon of certainty. It was equally alive to the other

Convenience modern canon of taxation, *viz.*, convenience. A set of rules formulated in

Manu (VII. 128, 139, 170f), the Sāntiparva (87. 17f) and the Arthaśāstra (II. 1) embodies the recognition that state

revenues ultimately depend on the production of wealth by individuals so that whatever injures the latter is bound to react on the former, that while taxation subserves the essential needs of the state, it involves a diminution of the peoples' wealth so that the statesman's task is to reconcile the needs of the state with the interests of the subjects. This point is cleared up by the same authorities by means of a host of analogies from nature (Arth. V. 2 ; Manu, VII. 128f; Sp. 71.16ff; 87.20ff; 88.4ff). The king should resemble the leech which sucks blood gently without causing pain to the victim ; the florist who plucks flowers but leaves more of them in the garden for future supply and not the coal-merchant who burns all trees outright ; the bee which does not sip all the honey of the flower at a time ; the cow-herd who does not pierce the udder of the cow with the hope of a capital milk-supply ; the mouse which nibbles the heels of a sleeping man with its sharp teeth so gradually that the wound is imperceptible. The essence of these metaphors is that taxation should not sap the productive source but leave a decent producer's surplus, that taxes should be levied or increased by easy instalments and not in a lump or by jumps, and that these should be raised at a time and place convenient for the subjects,—all these as much on economic as on political grounds.

The main item of land revenue is the customary share of agricultural income indifferently termed *bhāga* or *bali* levied on ordinary revenue-paying lands. Manu fixes it between 1/6, 1/8 or 1/12 according to the quality of the soil (VII. 130).¹ Gautama raises the lower limit to 1/10 (X. 24). Śukra's schedule gives 1/6, 1/4, 1/3 and 1/2 according to the nature of soil, rainfall and irrigation facilities (IV. ii. 227-30). It is noticeable that there is a gradual rise from the moderate

¹ The scale cannot have been meant for the varying needs of the state for which a different schedule is given elsewhere (X. 118). The scholiast's note on Gautama X. 24 removes all doubt on the point.

traditional rate of 1/10. The Arthaśāstra in its characteristic fashion substitutes 1/6 for the customary 1/10 in the story of the beginning of kingship (I. 13). This rate had a wide currency and a firm hold on legal mind, so much so that the king was addressed with the familiar sobriquet ‘*sadbhāgīn*’ (Arth. II. 15; Baudh. I. 10. 18. 1; Vāś. I. 42; Viś. III. 22. Pārāsara. II. 14; Nār. XVIII. 48; Sp. 69.25; 71.10). But elsewhere the Arthaśāstra significantly recommends upland (*sthala*) and lowland (*kedāra*) to be entered separately in the field-register of the *gopa* and enjoins a threefold gradation of villages after the manner of Gautama and Manu upon the revenue officer (*samāhartṛ*, II. 35; cf. Suk. IV. ii. 220f). This together with a similar reference in Book V, chapter 2, indicates that differential rates for different classes of soils are intended. The Agnipurāṇa again mentions rates between 1/6 and 1/8 for different kinds of paddy crops (223.26f). Thus the assessment varied according to the quality of land and the nature of the crop : the *sadbhāga* was only a traditional or average rate, not the fixed or universal rate, in this respect resembling somewhat the ‘tithe’ in European fiscal terminology.

This fairly high rate of 1/6 or 16·6 p.c. has been adversely compared to the present rate which is estimated between 7 to 10 p.c.;¹ and the view that assessment of holdings falls much lighter in British than in ancient India has been upheld not only by Anglophils and modern administrators but also by scholars in oriental studies.² But was taxation really fixed at as high an average as 16·6 p.c. in ancient India? It has been scarcely supposed that while in

British India the rate of 7-10 p.c. is
Share of produce or assessed on gross produce, the old average
of profit?
rate of 16·6 p.c. was most probably levied
on profit. Kullūka explains Manu VII. 130 in the sense

¹ Imperial Gazetteer, IV. p. 217.

² Washburn Hopkins : *op. cit.* ; M. H. Gopal : *op. cit.*

that the share is to be estimated on the increase upon the capital employed (*mūlyādhikyoh mūlyādadhikayoh*). Medhātithi and Gorindarāja are concurrent and Nandana is even more explicit. “In every case the share is on profit made after deducting expenses (*sarvatra vyayavyatirikta-lābhavishyā bhāgakalpanā*).”¹ In the Śāntiparva it is enjoined that taxes should be fixed not on gross income but after examination of incomes and expenditure (120.9).

An analysis of Sukra’s maxims corroborates the presumption. As the first postulate of good agriculture it is stated that “that agriculture is successful which yields a profit twice the expenditure (including government demand—*rajabhāgādīvyayatā*) after duly considering the variations in actual produce from good, middling or bad lands. Anything less than that inflicts suffering on the people” (IV. ii. 2).

Thus 1/8 of the produce must cover incidental expenses and land tax and hence the land tax must be much less than 1/2, 1/3 or 1/4 of gross yield.

As a rider to this may be read the injunction that “the king should demand no taxes from those people who undertake to dig canals, tanks, wells, etc., or bring under cultivation new lands until they realise a profit twice the expenditure” (IV. ii. 242-44; cf. Arth. III. 9).

Thus the tax must be fixed on profit and this profit must be at least twice the expenditure in case of lands under new enterprise.

Baden Powell observes a “primeval simplicity” in ancient land revenue assessment. “Being a share of the gross produce there was no question of any complicated calculation of the cultivator’s profit or the cost of production, nor about the relative value of land, or the productiveness of the season. Whatever the land produced, little or much was heaped on

¹ Haradatta, however, understands Gautama X. 24 as implying the share of gross produce.

the threshing floor and the king's officer superintended its division in kind."¹

But this primitive simplicity is not traced in the systems of Manu, the Arthaśāstra and the Śukranīti. They all presuppose a careful gradation of land, survey and measurement, calculation of outturn as well as expenses per unit of land and so forth. On the other hand they never testify to a system of sharing crop at the threshing floor known as *batai*.

The periodical survey and measurement of land of which we have concrete evidences in the Pali

Cadastral survey

works² and Megasthenes (Str. XV. i. 50)

is a direct challenge to the notion of primitive simplicity of sharing gross produce. The most obvious explanation of this cadastral survey (besides the necessity of keeping a record and settlement of boundary disputes) is this. Cultivators might extend their plots by acquisition of new land. In that case the cost of production per unit of land would be less and profit per unit greater. Accordingly the state would have a higher share. And so *vice versa*. The state would after the survey, calculate possible expenses in each plot and after the harvest, collect the share duly deducting for the estimated expenditure on behalf of the cultivator. The stories of the Kurudhamma Jātaka (II. 376ff) fully satisfy this explanation. The pious hesitation of the surveyor that the king or the farmer will be loser if the stick of the measuring rope is pitched on this or that side of a crab-hole situated just at the boundary of a field reflects that the king's share was guided by the measurement. In other words measurement was followed by a revision of assessment obviously on a calculation of the

¹ Land Revenue in Bengal, p. 35.

² King's officers come to a village to take a survey of fields,—khetappamāṇa gahapāṭṭhāya, Jāt IV. 169. Sāmīntasāmīvohāre or surveyors (An. III. 76),—rajuḍandehi bhūmippamāṇe gāhake saṃīvohāre (Com.), i.e., those who hold the office of measuring the ground with rope and rod.

expenses—since there seems to have been no graduated tax on property. The *setthi* who repents plucking a handful of corn from his field when he had still to pay the king's *bhāga*, apparently indicates that the land revenue was realised by the method of appraisement of the standing crops which is now known as *kānkut*. The measurement of the king's share of the crops at the door of the royal granary under the supervision of the *donaṁapaka* does not conflict with the theory above, since the sharing may have been done after leaving aside the measured amount to meet the expenses of the tax-payer.

The simple method of division of produce would preclude all complications about cost of production or relative value of land: whereas we find in the Arthaśāstra and the Smṛtis not only stringent rules about leaving a good producer's surplus but also a classification of soil on the basis of fertility and differential assessment on the same. The fact of the matter is that the king's share did not necessarily mean a fixed share. It was determined by considerations of fertility of the soil and by the needs of the state or of the cultivator. When the state was in difficulty it would go up, when the cultivator was in want, it would come down, the rebate being reduced to complete remission in extreme cases. The system of measurement and survey and differentiation of soil according to productivity also indicates that land revenue assessment was not permanent but revised at intervals although a constant revision was not necessary as at present when the land revenue being assessed and paid in fixed cash the increase or decrease in the yield of a plot is not immediately reflected by a corresponding increase or decrease of the state's revenue.

The complex revenue system of the Smṛtis and of
Payment in cash or
in grain? the Arthaśāstra has even led a scholar
 to advance the drastic theory that
 the state took the land revenue in money and not

in crops.¹ The arguments given are: (1) the revenue of an ordinary village is stated to be 1,000 silver *karṣas* in the Śukranīti, (2) measurement and grading of land is not required in division of produce, (3) the system of taking share on net profits is opposed to the division of produce, (4) remission of taxes is also an institution of money economy and not of the division of produce.

As for the first point, it is seen in earlier books than the Śukranīti that an advanced conception of government required the keeping of an elaborate record of the state's estimated income under various heads. This necessitated computation of the consolidated income in terms of cash in each revenue area. In the Jātaka tales villages are often described as *satasahassutīthānaka*, i.e., yielding a revenue of 100,000 a year. But this very literature definitely shows that the king took his share in grains. The second and third contentions are already answered. As regards the fourth, there is no reason why remission of taxes should be inconsistent with division of produce. Only in the case of total failure of crops the question would arise. But we have no such instances of relief in dire famine. Remission in famine meant remission during scarcity or bad harvest (Arth. II. 1; Mbh. XIII. 61. 25) presumably when the producer had a bare surplus over expenditure.

On the other hand there are direct instances in the Jātakas and the Epics of payment in grains. In the Sāntiparva the king is directed to enrich his treasury with swollen corn (*koṣṭhāgārañca te nityam sphitairdhānyaiḥ susamvṛtam*, 119. 17). As will be presently seen, even in the Sūrtis there are categorical references to revenue levied in grains from agricultural land.

¹ Balkrisna : Hindu Taxation System, Indian Journal of Economics, Vol. VIII.

The *bhāga* is the main item of land revenue, the regular, customary and legitimate share of the king on agricultural produce in ordinary revenue-paying land. But the king frequently claimed additional imposts in the nature of *ābhābs* indicated in most of our literature by the generic term *bali*. Shamasastri, Vincent Smith¹ and F. W. Thomas² understand *bali* to be a religious cess. In the Arthaśāstra it appears as a particular tax in a long list under the head of 'rāṣṭra' or counterpart (II. 6, *bali*, Additional taxes: 15) and is explained by Bhāṭṭaswāmī as a local tax of 1/10 or 1/20 above the regular 1/6. Five of the commentators on Manu VIII. 307 explain it as the regular 1/6 of grain share and only Nandana—the sixth, regards it as indicating all taxes—normal and additional. In the wider sense '*bali*' appears in the Vedas³ and sometimes in the Jātakas (II. 17; III. 9; IV. 109, 169). Elsewhere in the Jātakas *bali* is a term for only additional and oppressive cesses (I. 199, 339; V. 98).⁴ In the Milinda *bali* is referred to as an emergency tax from which the four chief ministers (*mahāmattā*) are free (p. 146). In the Rummimdei Pillar Inscription of Aśoka it is used exclusively in this narrow sense. The text goes,—'Lummini gāme ubalike kate aṭhabhāgiye ca'—‘made the village Lummini free of *bali* and paying an eighth share.’ The *bali* or additional tax was remitted and the regular 1/6 or 1/4 as it might have been, reduced to 1/8.

Thus under the term '*bali*' were grouped certain irregular demands of the king on agricultural land. In fact, the evolution of the Indian taxation system is a reflex of the growth of king's powers and functions and of his consequent

¹ Inscriptions of Aśoka—Rummindei P. In

² J. R. A. S., 1909, p. 467.

³ Macdonell and Keith: Vedic Index, II, 62

⁴ The phrase 'bali-piṭitā' is instructive. There is no reference to oppression in connection with the *bhāga* or grain-share.

demands on the people's purse. In the story of the traditional origin of kingship we hear only a fixed share in grain and animals. This accords with the old Vedic custom. Next comes a grading of land and differential assessment together with the king's claim to certain irregular imposts. Of both of these there is positive evidence in the Maurya period. The materials gleaned from the Sāstras and the Jātakas may be verified by comparision with these and other objective data.

Megasthenes observes a class of country officers (agronomoi) who "superintend the rivers, measure the land as is done in Egypt and inspect the sluices, by which water is let out from the main channels into their branches" and who "collect the taxes" (Str. XV. i. 50). The purport of the phrase "as is done in Egypt" is thus elucidated by Strabo:

"This exact and minute sub-division is necessitated by the constant disturbance of boundaries caused by the Nile in its inundations in which it adds (to some) and takes away (from others), alters shapes and destroys the other signs by which the property of one can be distinguished from that of another, so that it (the land) has to be remeasured repeatedly."

Thus it is most likely that the Maurya officers mentioned above were concerned with the measurement and supervision of alluvial deposits for revenue purposes as the lands bordering the great Bengal rivers have frequently to be surveyed now-a-days for revenue assessment and for the settlement of boundary disputes. If Bühler's identification of the Rājukas¹

¹ Cf. Rājuka and *raju*—the survey-tax of the Arthaśāstra. Hultzsch makes the following illuminating observation on the expansion of the functions of the original surveyor to those of a civil official of the rank of Aśoka's Rājuka.

"The Rājuka originally 'held the ropes' in order to measure the fields of the ryots and to assess the land tax. Thus the word became the designation of a revenue settlement officer, just as in British India the chief administrative officer of a district is still called 'collector' because his special duty is the collection of revenue." Corpus Inscriptionum Indicarum, Vol. I, p. xli.

of Aśoka with the *rajjuka* or *rajjugāhaka amacca*¹ of the Jātaka stories be correct and if both may be aligned with the *agronomoi* of Megasthenes, it would point not only to an organised system of land survey as hinted in the Arthaśāstra but also a realisation of the great schemes of the Arthaśāstra to keep a record like the Domesday Book of William the Conqueror.

As for additional cesses besides the fixed share the testimony of the Rummindēi Edict is supported
On bhāga and bali. by Megasthenes' account. Apropos the cultivators, Diodorus says that besides the land tribute they pay $1/4$ of the produce to the king (II. 40). Thus there are two taxes, one the regular *bhāga* and another the irregular *bali* which is fixed at $1/4$.²

The next stage of progress in the land revenue system and royal pretension is seen in the Junagadh Rock Inscription

¹ Much earlier than the time when the Jātaka *gāthā* and commentary were composed, the original surveyor had acquired the position of the 'driver of the chariot of state.' The *rajjugāhaka amacca* is the holder of the reins of government as well as holder of the rope of survey.

² M. H. Gopal who takes it as axiomatic that the Arthaśāstra is not only a contemporary work with Megasthenes, but that it details the actual conditions of Maurya administration, makes a hypothetical statement that the extra $1/4$ seems to have been the irrigation cess or *udakabhāga* of the Arthaśāstra which varies in that work between $1/3$ and $1/5$ of produce, $1/4$ being presumably the common rate. Thus one presumption is piled upon another. The extra impost of $1/4$ may be identified *a fortiori* with the *bali* of the Lummini village, the precise nature of which must remain unknown until further light is available from new materials. *Op. cit.*

By following a different line of argument Ghoshal comes to the conclusion that Megasthenes' $1/4$ was the only and regular share of the grain produce obtained as land revenue by the king. He follows a revised translation of Diodorus by a German scholar who substitutes the phrase 'in the absence of a special arrangement' for McCrindle's 'besides the land tribute.' Now what may possibly be implied by paying $1/4$ of produce in the absence of special arrangement? Here again the Arthaśāstra is called to assistance. The king's share may rise if he lends cattle and implements. But is there any provision in the Arthaśāstra of the king lending cattle and implements to *free-holders* as distinguished from royal tenants? The affirmation of the scholar, that the emergent rate of the Sūktis and of the Arthaśāstra was the normal rate of land revenue under the Mauryas, is an edifice built on shifting ground and no supplementary evidence is available to buttress it. *Op. cit.*, pp. 168-70.

of the Śaka Rudradāman belonging to the 2nd century A.D. While the main heads of land revenue were *bhāga* and *bali*, it was exceptional nobility on the part of the Mahākṣatrapa that he reconstructed the Sudarśana lake out of his own treasury without burdening his subjects with oppressive taxes like *kara*, *viṣṭi* or *prañaya*. All these sur-taxes find mention in the Arthaśāstra which, in this respect corresponds to Śaka Mālwa more closely than to Maurya Pāṭaliputra.

The *kara* and the *pīṇḍakara* appear in the Arthaśāstra among the additional cesses in the list of *rāṣṭra* or country-revenue. The *kara* seems to be an annual

Kara tax on property. The *pīṇḍakara* is defined by Bhaṭṭaswāmī as a tax levied on a whole village in lump and collected annually in kind. The *kara* and *pratikara* occur also among certain other charges outside the formal scheme of classification, charges which the *samāhartā* raises from the village and is required to enter separately in the 'pipe-roll' (II. 35). Manu also recognises *kara* as an additional tax (VIII. 307). Of course, like the *bali*, the *kara* also became a generic term and was applied by many to denote taxes all and sundry.

The *viṣṭi* is impressed labour. Labour tax was of two kinds (Arrian, XII). There was the labour paid in lieu of

Viṣṭi grain or cash by poor people (*simphanika*)

which the Arthaśāstra thinks may be used by the state in its factories (II. 15). Manu allows this concession to Śūdras, craftsmen and artisans (X. 120), and Arrian testifies that the two latter classes paid their taxes by labour (XII). While this tax in the form of labour was a concession to payers, the *viṣṭi* was a form of coercion, the additional and coerced labour from freemen which amounted to gratuitous performance of public or royal services (Gaut. X. 31; Viṣ. III. 32; Manu, VII. 138; Arth. I. 4, VIII. 1, X. 1; Mbh. XIV. 95. 39). In the Arthaśāstra it appears in

the list of special charges along with *kara* and *pratikara* (II. 35) paid by villagers and is expected to be entered by the *gopa* in his register of houses, probably to be assessed on a principle of rating according to houses.

For what specific purposes was the corvée employed and how it fell on the subjects? The Arthaśāstra wants labour to be impressed in state workshops in a staff of sweepers, weighers, measurers, slaves, etc. (X. 4). There is also provision for employing it in tillage of royal domains (II. 24). In the Mahābhārata it is wanted to be exacted from artisans only with payment of food as unto kine and asses (XIV. 95. 34). The Jātaka stories give graphic pictures of how it actually worked.¹ The people of Kāsi had to serve their king's fiat who was passionately fond of hunting and forced his subjects to beat the deer forest to the neglect of the cultivation of their farms (I. 149f). In the introductory portion of another story the gloomy prophecy is made when needy kings "shall set the whole country-folk to work for them;—for king's sake shall the oppressed folk, leaving their own work, sow early and late crops, keep watch, reap, thresh and garner, plant sugar-canies, make and drive sugar mills, boil molasses, lay out gardens and orchards. And as they gather in all the diverse kinds of produce to fill the royal garner, they shall not give so much as a glance to their empty barns at home."

Te evam duggatā sabbe janapade attano vapakamme karessanti upaddutamanussā sake kammante chaddetvā rājū-nam̄ ūeva athāya pubbañña paraññāni ca vapantā rakkhantā layantā maddantā pavesantā uccukhettani karontā yantāni vāhentā phānitādini pacantā pupphārāme phalārāme ca karontā tattha tattha nippahannāni pubbaññādini āharitvā rañño koṭhāgāram eva pūressanti attano gehesu tucchakot-ṭhakesu olokentāpi na bhavissanti. I. 339.

¹ It is wonderful that Rhys Davids finds no trace of forced labour in Buddhist literature. Buddhist India, p. 49.

Thus would the cultivators be impressed to work the farms of impoverished rulers leaving their own lands to decay. Of course this prognostication would materialise in days of moral disorder that would sweep the earth and not in normal times. But that the *visti* was a potential source of oppression bears no doubt. The Arthaśāstra warns against its tyrannical exaction from agriculture (II. 1). Like the *bali* this objectionable form of exaction gave a tool to mis-government and forms one of the legacies handed down to our own day (begār) on worse hands than the king's.

The *pranaya*¹ or benevolences are most probably emergency revenues resorted to for the replenishment of depleted

Pranaya treasury by the enhancement of standard rates.

The Arthaśāstra falls back on this remedy in a financial crisis and wants it to be levied from cultivators (*karsaka*), dealers and craftsmen (*vyavahārin*) and animal breeders (*yoniposaka*), the only exemptees being owners of *brahmadeya* land (V. 2). The benevolence on cultivators is assessed at 1/4 of grains but rises according to the quality of the soil up to 1/3 while in Manu the highest rate of emergency tax on agriculture remains 1/4 (X. 118). The *pranaya* was beyond doubt another handle given to oppression and avidity.

Further details on the revenue system, at least as it prevailed in the time of the Mauryas, is obtained by fragmentary accounts of Megasthenes which bear comparison with evidence from other litera-

Royal domains

ture. The principal source of income after the regular *bhāga* was the output or revenue from royal demesnes. That the king had large estates of his own is clear from all accounts. In the Arthaśāstra's conception of polity the administration of royal farms is entrusted to a special

¹ Kielhorn explains it as a contribution nominally voluntary (given from affection) but which people feel constrained to make. Ep. In., VIII. 6.

superintendent (II. 24). These might be collected either by the direct agency of state officers or under their superintendence by tenants. In the first case the superintendent is to work the estates by means of slaves, free labourers and convicts. But obviously the crown lands were large in proportion to labour supply. Hence fields may also be leased out to cultivators on attractive terms. If they have their own animals and implements they get half their harvest and if they work with royal capital and implements, their share is $1/4$ or $1/5$ of produce.¹ The collective output of royal farms is called *sītā* and tops the list of land revenue and cognate charges treated under the head of *rāṣṭra*.

We have already noticed the Jātaka testimony to royal domains worked by free labour. Grants of land from king's estates appear in the title deeds of the Sātavāhanas recorded in the Karle and Nasik caves. The observation of Strabo on the strength of Megasthenes that the cultivators work the land for hire getting a fourth part of the produce (XV. i. 39) had long been a puzzle to historians and was dismissed as anachronistic with the version of Diodorus on the rate of assessment (II. 40). It has been, however, recognised of late that while Diodorus speaks of cultivators in ordinary revenue-paying lands, Strabo deals with cultivating tenants in royal demesnes who did not give but obtained $1/4$ of produce for hire.²

Closely related or analogous to the agricultural produce or share thereto from crown lands was the state's income from (1) reserve forests, (2) mines and salt-centres,³ (3) state establishments of livestock, (4) sale or loan of grain.

The *paśu* or tax levied on cattle was a regular tax which fell upon the pastoral wealth as the *bhāga* fell upon

¹ Note that while tenant-cultivators in crown land obtain $1/4$ or $1/5$ of produce, their compeers in ordinary private land are entitled to only $1/10$ (Arth. III. 13; Yāj. II. 194; Nār. VI 2. 3). In Viṣṇu the share is $1/2$ (LVII. 16).

² Ghoshal : *op. cit.*, p. 168ff. Gopal : *op. cit.*, p. 55.

³ Mines, pearls and salt were royal monopoly. Pliny, XXXI. 7; Karle and Nasik Cave Inscriptions; Mbh. XII. 69. 29; Arthaśāstra, II. 12.

agricultural wealth. Megasthenes notes that the nomadic herdsmen paid their taxes in cattle to the Cattle tax Mauryas (Arr. XI). The Jātaka stories notice its oppressive exaction (II. 240). In the Arthaśāstra the contributions required to be entered separately in the 'pipe-roll' are paid in *dhānya*, *paśu*, *hiranya*, *kupya*, *vīṣṭi* and so forth. The Smṛtis are familiar with the contribution in cattle and assess it at the low rate of 1/50.¹ This is probably a levy of amount or value upon the agricultural livestock of cultivators. The commentator to a Jaina text understands charges on domestic animals to mean taxes on sales thereof payable in kind or in cash; traces of both these customs are seen to have survived down to the Moslem and British periods.²

Presents or royalties form another head of income derived from villages as well as towns.³ The *utsanga* in

the Arthaśāstra is, according to Bhaṭṭa-

swāmī, what is paid by inhabitants of the city and country part on the occasion of some festive event such as the birth of a prince. The Jātakas have a story that the people of Kāsi brought a *kahāpana* apiece for a newborn prince's milk-money (*khīramūlam*) which the pious king did not want to keep but the people pressed and left back (IV. 323). The Jātakas offer many instances of presents which are brought to the king (*paññākāra*, VI. 42, 342) on the occasion of his coronation (chattamamgaladivase, III. 407f) or even when approaching him with a petition (II. 166). Strabo writes that during the hair-washing ceremony of the king the people vied with one

¹ The Agnipurāṇa gives a schedule of contributions from villages very similar to the Smṛtis; but in the cases of *paśu* and *hiranya* it makes a big jump from 1/50 to 1/5 or 1/6. The Arthaśāstra schedule is : Fowl and pig—1/2, Inferior animals—1/6; cow, buffalo, mule, ass and camel—1/10.

² For references see Ghoshal : *op. cit.*, p. 60.

³ The custom of the king getting presents from his subjects comes down from Vedic times. See Zimn.er : Altindisches Leben, p. 166.

another in making him rich presents (XV. i. 69). The Mahābhārata, besides furnishing similar instances, speaks of voluntary contributions (*dakṣinā*) made by the people to the king for performing sacrifices for public welfare (XIII. 61. 24). All these offerings, literally voluntary, were really the tribute paid by fear to power and might or tips for the acquirement of specific favours and could hardly differ from the *bhet* or *nazarānā* exacted from poor tenants by social magnificoes with indirect pressure over large parts of India to-day.

The Arthaśāstra and the Smṛti works present a lot of similar imposts on land or from village parts which with

Miscellaneous imposts
in the Arthaśāstra. the present state of our resources cannot be verified by positive data and can at best be taken as indicator of the progress

of early Indian financial speculation. The list of *rāṣṭra* or revenue from country part supplemented by references elsewhere in the Arthaśāstra consists of 14 items. Among these *sītā*, *bhāga*, *bali*, *kara*, *pindakara* and *utsanga* are already dealt with in comparison with other evidences. The *senābhakta* is explained by Bhaṭṭaswāmī as “the king's dues of oil, rice and the like payable at the time of the marching of the army as prevalent in specified countries.” The *aupāyanika* is an unspecified contribution or present. The *pārsva* is a super-tax collected on excess profit, a marginal revenue like the land-cess in British India. The *kauṣṭheyaka* is tax on land below tanks, lakes and other sources of water built by the state. The *parihinaka* is compensation for damage done by cattle possibly in crown lands.

The other three fiscal terms have long presented much difficulty to scholars, viz., the *raju*, *coraraju*, and *vivīta*. The *raju* literally means 'rope' or measuring tape of the land survey. In the technical fiscal sense it apparently refers to a unit of measure applied for purpose of cadastral

survey; and to cover the cost of operations a revenue was realised from the parties concerned like the cost of settlement in our times. The *corarajju* is rope for binding thieves and *vivīta* is pastures. From an examination of the functions of the *vivītādhyakṣa* and the *corarajju*,¹ the jurisdiction of both extending outside village limits, it would appear that these comprised fees levied from villagers for the tracking of criminals, the escorting of caravans and the protection of cattle. So while *raju* is the survey or settlement tax, the *corarajju* and *vivīta* are police taxes.

The Arthaśāstra advocates a measure which amounts to the claim of the state to the unearned increment on land. During the sale of land and buildings by public auction the increase over the regular price together with the usual tithe belonged to the state (spardhayā mūlyavarddhane mūlyavṛddhiḥ saśulkā kośam gacchet, III. 9). The same rule applies to other goods (II. 21).

The method of land revenue assessment and collection in the Arthaśāstra throws further light on certain additional incomes to the treasury, which may not be scrupulously legitimate and above reproach. The superintendent of the treasury is to increase king's receipts by underhand means (*upasthāna*)² in the process of collection. The taxgatherers are to practise certain profitable sleights of hand. Then, there is remarkable difference in the balance and weights used for king's receipts and those in general use (II. 19). Lastly there is a *vyāji* or compensation fee levied above the measured share on certain liquids like oil, etc.

The Smṛti works (Gaut., X. 25, 27; Manu, VII. 130, X. 120; Viṣ., III. 24f) and the Agnipurāṇa detail certain

¹ Officers called *cauroddharanika* and revenue called *cauroddharaṇa* are seen in later inscriptions. Ep. In., XII, 8, 18; XVII. 17. The *vivītādhyakṣa* is to examine passports and guard the pasture grounds which are opened between two dangerous places (*bhayāntaresu*), II. 34.

² *Paryuṣitamp̄ prārjitaṁ*, II. 15,—recovery of arrears.

miscellaneous contributions raised from villages. These constitute roughly the following schedule :
 In Smṛtis (1) *Paśu* and *hiranya* = 1/50 (1/5 or 1/6 according to Ap.), (2) Roots, fruits, flowers, medical herbs, honey, meat, grass, firewood, scents, flavouring substances, leaves, skins, wickerwork, stonework, clarified butter etc. = 1/6.¹

The term *hiranya* has not yet been solved to satisfaction. In the Arthaśāstra it occurs in the list of different forms of payment (*dhānya*, *paśu*, *hiranya*, *kupya*, *āyudhiya*, *viṣṭi* and so forth) which the *samākhartā* is required to enter separately in the 'pipe roll' (II. 35). The suggestions that it was a tax on the hoard of gold, or on income, levied in gold currency are rejected by Ghoshal on the following grounds. (1) From its occurrence in the above-mentioned sources along with cattle and roots, fruits, flowers, etc., it appears to belong to the group of taxes on agricultural and industrial products. (2) In the land-grants it is conjoined with *bhāgabhoga**kara* and with *dhānya* both of which constitute king's customary grain-share. (3) It is improbable for a state as contemplated in the Smṛtis to draw part of its normal revenue from gold. By referring to conditions prevailing in Moslem India before the reforms of Todar Mal, he explains *hiranya* as "a tax in cash levied upon certain special kinds of crops as distinguished from the tax in kind which was charged upon the ordinary crops."² The reason given,—that such crops are difficult to divide is not very clear and convincing, and fails to account for the inordinate discrimination in the share demanded by the king for the two classes of crops, viz. 1/50 for one and 1/6 for the other.³

¹ Haradatta reads the passage in Gautama and Viṣṇu as indicating 1/60 which is improbable.

² *Op. cit.*, p. 62.

³ Of course so far as the Agnipurāṇa rate is concerned there is no such discrimination.

As regards the contribution of 1/6 from roots, fruits, flowers, etc., a host of parallels may be drawn from later and recent conditions.¹ Meat, honey and clarified butter comprehend the pastoral and farming occupations of villagers while earthenware, stoneware and wickerwork comprise the whole range of cottage manufactures. So, no branch of villagers' income, agricultural or industrial, is to escape the rigorous and all-pervasive fiscal system of Manu, Viṣṇu and Gautama.

The heads of income from land and village wealth may be concluded with the enumeration of ^{Devolution, confisca-}
_{tion, fine and bribe.} devolutions, confiscations, fines (*danda*) and bribes (*lañcam*). Treasure trove and intestate or ownerless land reverted to crown (Jāt. I. 398; III. 299; IV. 485; VI. 348; Sn. I. 89). The assets of the rich people who sometimes took to asceticism with whole families without leaving an heir, formed a lucrative income for the state. Fines and confiscations are dangerous weapons in the hand of poor and unscrupulous kings; although in the Sāntiparva it is strictly reminded that they are intended "to create terror and not to replenish the treasury" (122. 40), there is no safeguard to control their application. Kings could also sell their judgments and favours and receive illegal gratifications (Jāt. II. 170ff), as much as their councillors and officials.

A large amount of revenue was lost to the state under ^{Revenue-free lands} the arrangement by which considerable portions of land were allowed to be held free of revenue or the revenue therefrom were transferred to be enjoyed by private persons. Of the assignment of rent-free land from royal domains and of revenues from particular villages, the Karle and Nasik cave inscriptions and the Jātaka stories offer plenty of instances. In the Arthaśāstra

¹ Ghoshal : loc. cit.

the *samāhartā* is required to enter such revenue-free lands (*pārihārika*) into his roll. Elsewhere a distinction is drawn between taxable (*karada*) and tax-free (*akarada*) persons as well as villages. These assignments and exemptions might be granted either unconditionally or in return for specific services. To the former category belong mainly the *brahmadeya* lands. In the Arthaśāstra the immunity of such property is enjoined even when benevolences and irregular taxes may be raised from all property, during emergencies (V. 2). Another class of revenue-free land in the Arthaśāstra is the *ātithya* explained by Bhaṭṭaswāmī as "lands granted to the judicial officers for the purpose of alms-giving and such other pious acts" (II. 20).¹ The forest produce is also declared to be free from any impost (V. 2). Except for the king's reserve forests, the wild tracts were regarded according to all authorities as no man's land. The immunity is evidently extended to forest-dwellers and adjacent villagers whom we find in popular stories gathering firewood and forest produce without interference.

Among the land held free of revenue (or the revenue of Transferred revenue; which is assigned) in exchange of specific Jāigir System. service to the state belongs principally the land assigned to king's officers in lieu of remuneration.² Grants without the right of sale or mortgage to the superintendents, accountants, *gopas*, *sthānikas*, vets, physicians, horse-trainers and messengers form part of the revenue administration in the system of the Arthaśāstra (II. 1). According to Manu (VII. 119) and the Sāntiparva (87. 6-8), the lord of 10 villages is to be remunerated with 1 *kula* of land (land cultivable with 12 oxen), of 20 villages with 5 *kulas*, of 100 villages with 1 village and of 1,000 villages

¹ Cf. the *inām* or *mu'afī* under Moslem rule.

² Cf. Jāt. I. 354; Ep. In, XV. 6f; XVIII. 22; Yuan Chwang, Vol. I. p. 176; South Indian Inscriptions.

with a townlet. The point of difference between the two testimonies is that the Arthaśāstra, unlike Manu and the Mahābhārata, contemplates not only rural administrators but other officials, higher and lower, as recipients of such grants and that it explicitly restricts the right of grantees to mere usufructuary possession. In the Arthaśāstra the grants of land to the *adhyakṣas* are made in addition to a cash salary of 1,000 *panas*. Although a distant resemblance is marked between this arrangement and the Moslem Jāigir System, it must be noted that the Arthaśāstra discountenances encouragement of colonisation by grant of villages (V. 3) which is the substance of the latter. But the arrangements of the Arthaśāstra foreshadows the Moslem custom through more than one institution. The class of villages which enjoy immunity on condition of military service (*āyudhiya*) is analogous to that form of Jāigir which involved the assignment of revenue for the maintenance of troops.¹

Apart from exemption from taxation granted in perpetuity, certain lands and villages enjoyed remission or reduction of revenues for a season or more.

Remission or reduction of revenue.

Remission of taxes for relief of cultivators during bad harvest is inculcated in the Arthaśāstra (II. 1) and the Mahābhārata (II.61.25). The Arthaśāstra (III. 9) and the Śukranīti (IV. ii. 242-44) also enjoin the same measure for improvement and extension of agriculture. Remission or reduction of taxation was conceded as occasional favour to a village, town or district

¹ The essential difference of the earlier institution from the Jāigir System are that (1) the right of the grantees were restricted to usufructuary enjoyment without hereditary rights and rights of ownership, (2) and that the grants did not carry with them transfer of executive power. Although in Manu and the Sāntiparva, the mere usufructuary possession of the grants is not as pointedly mentioned as in the Arthaśāstra the same implication is there, since it is wanted that the remuneration village of the *śatādhyakṣa* must be within the jurisdiction of the *sahasrādhyakṣa* for otherwise as Nilakanṭha annotates, he may tax oppressively.

(Jāt. IV. 169; Rummendei P. E.; Khāravela's Hathigumpha In.¹⁾) inasmuch as a village or a specified area might suffer an increment of revenue by way of punishment or from royal fiat (Jāt. III. 9).

The works on law and polity which punctiliously elaborate sound principles of taxation took a dangerous move

when they proceeded to lay down special
Doctrine of Emergency. rules for emergency.

Now in all ages and in all climes the doctrine of necessity has overlept its bounds and become a convenient euphemism of tyranny and avidity. In ancient India emergency revenues might be raised either by the enhancement of standard rates or by the imposition of wholly irregular demands. The levy of *pranaya* advised by the Arthaśāstra is the increment of standard rate to 1/4 of grains in case of cultivators, rising up to 1/3 according to the quality of the soil. In Manu the highest rate of emergency tax on agriculture remains 1/4. The scale of *pranaya* from animal-breeders is fixed in the Arthaśāstra at 1/2 of cocks and pigs, 1/6 of small animals and 1/10 of cows, buffaloes, mules, asses and camels. Besides these a host of forceful and fraudulent practices are enumerated with brazenfaced chicanery which it would be sickening to relate. The teachings on *rājadharma* in the Sāntiparva give *carte blanche* to the king. The rule that taxation should be mild is for normal times. In times of distress a Kṣatriya may forcibly take what he can from the rich and commits no sin by oppressing his subjects for filling the treasury (130. 24ff; Suk. IV. ii. 2; Somadeva Nītiśāra, XXI. 14). Necessity knows no law is an accepted maxim of Indian financial speculation which gave a free hand to extortionate and fleecing demands of which descriptive accounts are not rare.

¹ “rājaseyam sampadasyamto sava-kara-vāṇa anugaha-anekāni satasahasān visajati pora-jānapadām.”

For a state entitled to 1/6 of net produce and a lot of additional taxes, why this nightmare of depleted treasury and nervous search for income? It was

Exemption of Brāhmaṇas.

because there was a big crack in the massive fabric of the Indian taxation system through which leaked out a major share of the state's legitimate dues. We have seen that private lands were fast concentrating in the hand of Brāhmaṇas—regular and secular.¹ Now we find that on the reverse of the Machiaevellian emergency rules the self-same books lay down an equally unsound financial maxim which exempted Brāhmaṇas as a class from taxation on the strength of their astonishing pretensions. Vāśiṣṭha expressly exempts Brāhmaṇas, particularly learned ones (I. 42f ; XIX. 23) from any exaction on the ground that they render spiritual service to the state and the attendant material welfare. The same statement occurs in Manu (VII. 133). Viṣṇu as well forbids taxes to be raised on Brāhmaṇas because they pay their tax in virtuous acts (III. 26f). Āpastamba accords the same privilege to learned Brāhmaṇas (II. 10.26.10) and Vṛhaspati follows in the same strain (XVII. 3). According to the Santipūrva the Brāhmaṇas are to enjoy immunity even when the doctrine of necessity may encroach upon the fundamental rights of property. Megasthenes himself notes that in Maurya India the Brāhmaṇas and philosophers paid no taxes (Str. XV. i. 32). Aśoka was not the only monarch to distribute unstinted largesses on these two classes (REs. V, VIII, IX). The Jātakas and the Sātavāhana Inscriptions offer further concrete instances how kings in recurring fits of pious generosity made over the revenues of entire villages to Brāhmaṇas, religious and worldly. Even the Arthaśāstra which treats politics as an independent branch of knowledge apart from

¹ See *supra.*, pp. 35f.

the canon, cannot free itself from this halter of uneconomic piety. Besides the reference to *brahmadeya* lands and to the exemption from *pranaya*, etc., it accords the priests of royal entourage the highest grades of salary along with the Crown Prince, the Queen Mother and the Queen Consort (V. 3). Not only is the Brāhmaṇa to be exempt from taxation but a king has no claim to the former's property even on the failure of heirs (Gaut. XXVIII. 41f; Baudh. I. 5. 11. 15f; Vāś. XVII. 84-87; Viś. XVII. 13f; Manu IX. 188ff; Arth. III. 5). The same authorities lay down the general rule that the Brāhmaṇa who finds a treasure trove keeps the whole of it while other persons who come to the same luck must make it over to the king: and why? Because the Brāhmaṇa is the lord of everything! (Manu VIII. 37; Yāj. II. 31). The effect of these rules on royal exchequer and consequently on the fiscal system may well be imagined when it is observed how sedulously gift of land to Brāhmaṇas was encouraged (Āpast. II. 10.26.1; Viś. III. 81-84; Arth. II. 1f; Agni-p. 223. 14; Mbh. XII. 343. 18, XIII. 62) and how kings vied with one another in this pious feat and vaingloriously recorded their unstatesmanlike bounties (Aśoka Edicts, Karle and Nasik Cave Ins., Kbāravela's Hathigumpha In.).

The argument may be put forth that the foregoing privileges accrued not to all Brāhmaṇas but only to *śrotriyas* or those who performed the sacrifice and studied the Vedas thereby proving useful to society. The Sāntiparva indeed carefully demarcates pious Brāhmaṇas who are to be exempted, from secular Brāhmaṇas who are to be fleeced with taxes and forced labour (76. 5-11; 77. 2f). But is there any universally recognised hallmark of piety? The Pali literature, especially the Jātakas, show that the recipients of *brahmadeya* gifts of land were not always devoted spiritualists (cf. Sut. II. 7). Even if it be accepted that wealth and privileges poured upon *bona fide* religious persons and

orders, history has abundant proof that such a constant outflow corrupts even the purest recipient and works his ruin. At any rate, the state became the poorer and had to lay its fingers in the pockets of the toiler.

It remains to be observed how this elaborate revenue system actually worked and how the people fared under it. As the system was not built upon rigid and inflexible regulations, it had a fair measure of elasticity which might be construed for both good and bad purposes. Hence under certain rules it rose to the lofty Smṛti ideal that the king gets the revenue only for the service of protection and spends every penny beyond his own wages for public good; while in the other extreme bankrupt profligates like Louis XV blackmailed their subjects sometimes breaking the economic backbone of the state.

Did the Maurya taxation system fall very lightly on the people? There is one reading of Diodorus' familiar passage which would fix the king's grain share at the high rate of 1/4. Leaving aside this controversial piece of evidence and the still more unsound logic that the Arthaśāstra—supposed to be the work of Candragupta's iron chancellor, is at its wit's end in search of revenues, it appears that extensive public and building works, wars and missionary propaganda had to be met from the people's pocket barring a large class of Brāhmaṇas. And in the tyranny of imperial officers which drove province after province into revolt under the later Mauryas, undue exactions must have had a conspicuous share.¹

The Sātavāhana king Gautamiputra Sātakarnī claims Sātavāhana and Saka to have "never levied nor employed taxes but in conformity to justice" (N.C.I, 2.i). The Saka Rudradāman is similarly proud of the distinction that he did not oppress his subjects with *kara*, *visti* or

¹ See Raychaudhuri : *op. cit.*, pp 302 ff.

pruṇaya and remained content with *bhāga*, *bali* and *śulka*. In the background of these vaunts we faintly discern pictures of oppressive and unlawful demands by less considerate rulers. And such pictures are presented in the Jātaka stories.

The tax-collectors (*niggāhakā*) were an overzealous lot
Oppressive taxation and became a byword for importunate demand (IV. 362). In the Śāntiparva it is admitted that they sometimes collect tax unfairly or actuated by lust and avarice from persons piteously praying for mercy—thereby destroying the king (*yadā yuktyā nayed arthān kāmād arthavaśena vā :kṛpaṇam yācamānānām tadrājño vaiśusam mahat*, 91.25). The Arthaśāstra (II.9) and the Sukranīti (i. 617f) lay severe strictures on over-collection. But these people took their cue from their masters whom the same authors give an ample latitude. In the Bhuridatta Jātaka it is stated in a verse that tax-gatherers ordered by the king plunder the wealth of cultivators like robbers without fear :

akāsiyā rājūhi vanusitthā
 tad assa ādāya dhanam haranti
 te tādisā corasamā asantā.....VI. 212.

They (*balisādhakā*) eat the cooked food of tax-payer, or kill a calf for skin, all at their sweet will (V. 106). A king is said to have drained his country of its gold by his exactions (IV. 224 ; cf. III. 319). Another by raising fines, *ābwābs*, cattle-tax (?) and cash levies crushes his subjects like sugar-canies in a mill (*dāṇḍa-bali-jamgha*¹—

¹ Rouse fails to make out its meaning and after much hesitation falls upon 'mutilations' (of legs). This is out of place in a list of revenues and discords with 'gahanena.' On the other hand the use of *jamgha* for animal (like the English 'head' for man) is not unknown. In the Arth. II. 35 there is an instruction on spies to ascertain the number of men and beasts (*jamghāgra*) in each family as well as their income and expenditure with a view to fix assessment of taxes. The commentary on 'jamghāgra' runs thus : *jamghāśabdena pādačāriṇo lakṣante kulasambandhinām pādačāriṇām dvipala catuspadānām agram jyattam*. 'Jamgha' is used in the sense of animal also in Jāt. VI. 34.

kabāpaṇādi gahaṇena ucchuyante ucchum viya janaiḥ pīlesi. II. 240). A gloomy picture of relentless extortion is drawn up as part of the great moral disorder that would prelude the nemesis.

" Kings shall be amassing wealth by crushing their subjects like sugar-canies in a mill and by taxing them to the utmost. Unable to pay the taxes the people shall flee from village, town and the like and take refuge in the borders of the realm."

ucchuhante uechuganṭhikā viya manusse pīlenta nānā-
ppakārehi balim uppādetvā dhanam ganhissanti manusse
balipīlitā kiñcidātum asakkontā gāmanigamādayo chaddetvā
pacceantam gantvā vāsam kappessanti. I. 339.

The kingdom of Kampilla was deserted by the people for oppressive taxation. Men betook to the forest with their families. Others remained indoors at night but on day-break fled to forests fencing their houses with thorn branches. " By day they were plundered by king's men, by night by robbers."

balipīlitā ratṭhavāsino puttadāre ādāya arauññe migāviya
carimṣu gāmatthāne gāmo nāma nābosi manussā rājapuri-
sabhayena divā gehe vasitum na sakkonti gehāni kaṇṭa-
kasākhāhi parikkhipityā aruṇe uggacchante yeva arauñnam
pavissanti divā rājapurisā vilumpantí rattim corā. V. 98 f.

In the Śāntiparva there is the warning that the king is to see that the agriculturists of the kingdom do not leave it through oppressive taxation (P. Ray, I. p. 299). The rules of the Arthaśāstra presuppose the same contingency (VII. 5.). Thus there were cases when the insatiable greed of kings ruined the whole country-folk and rendered the prosperous country-side into depopulated deserts.¹

¹ In South Indian inscriptions there are interesting evidences of organised no-tax campaign by cultivators against such unlawful exactions. Government Epigraphic Report, 1918, p. 163.

Truly, the king is '*viśāmattā*'—the devourer of subjects!

These instances of oppressive taxation lead to another question—whether ancient states used to Surplus or balanced budget? accumulate large surpluses or they presented a balanced budget.

Opinion inclines to the former view.¹ Indeed, the systematic realisation of $\frac{1}{6}$ of produce and the additional imposts would automatically keep large surpluses. But it has been seen that there are reasons to suppose that the $\frac{1}{6}$ was probably raised not on produce but on profit. Again why is so much pre-occupation with the depleted treasury and provision for almost unlimited emergent taxes if there were no deficits? The numerous cases of oppressive exaction show further that these measures had to be taken recourse to whenever war, sacrifices or megalomaniac bounties shook the poise. The Mahābhārata narrates a story that the ṛṣi Agastya went to wealthy kings in quest of money but finding income and expenditure evenly adjusted, even that redoubtable anchorite had to return empty-handed from all quarters (III. 93). The possibility of huge surpluses was also counter-acted by the big volume of transferred revenue and revenue-free lands and by the manifold heads of expenditure over departments to which the state extended its activities.

Regarding the sphere of action of the state, it has been remarked, "A policy of non-interference was recognised as the ideal policy of the state, the functions of which were ordinarily restricted to 'the irreducible minimum,' viz., the protection of life and property and realisation of revenue for the proper execution of that duty."² Not only is the policy

¹ Ghoshal : *op. cit.* ; Gopal : *op. cit.* The political maxim in the Mahābhārata is that the expenditure should never exceed $\frac{2}{3}$ of the king's income. II. 5. 70-72.

² R. K. Mukerji : Local Self-government in Ancient India, p. 3.

adumbrated in the Arthaśāstra a clear contradiction of this position : the complicated system of taxation developed by the Indo-Aryans is in itself an antithesis of the *laissez-faire* doctrine and a strong evidence of the multifarious duties of the state. The Indo-Aryan state was not a mere police state guarding person and property although that was the original term of the social contract. As in the case of the heads of income, the study of heads of expenditure reveals the state in both its opposite aspects,—in solicitous care for the people whose welfare it holds in trust and reckless squanderings on vainglorious exploits and pseudo-religious practices in the name of public good. We are concerned here only with those heads which unfold the position of the state touching rural economy.

Public works of diverse sort formed the main channel of expenditure and engaged the chief attention of a benevolent state. Erection

Public works and buildings. of almshouses (*dānasālā*) at important centres of the towns is a regular feature of the Jātaka stories and from here food was daily distributed to the indigent throughout the kingdom (I. 262, II. 367, III. 129, 470, IV. 355, 402, VI. 484). Some kings took interest in the construction of rest-houses for travellers (*āvasathāgāra*) in villages or in trunk roads at intervals.¹ Free dispensaries for men and for beasts were opened by Aśoka all over his Empire (R.E. II; P.E. VII). Canals, tanks and wells for drinking and irrigation purposes and other irrigation constructions were frequently undertaken. Works of building and repair for artistic, commemorative or propagandist purposes were an acknowledged sphere demanding the state's resources in which Aśoka, the Sungas and the Kuśāṇas took special interest. Colonisation, road-making, town-planning and reclamation of virgin lands

¹ See Ep. In., VIII. 8-10. iv, 12.v.

were other features of absorbing interest subsidised or undertaken by the state (Arth. II. 1; Jāt. V. 35, 511).

An organised system of poor relief was demanded by the paternal conception of government (Gaut. X. 9ff; Arth. II. 1). In the Mahābhārata it is repeatedly extolled as a feature of good government. It seems that in several states the decrepit and imbecile, the stranded widow and orphan were maintained at state expense (V. 30. 40f; cf. Arth. II. 1, 23) or provided with home, clothes and food (XII. 42. 11, 59. 54, 71. 18, 86. 24). Āpastamba enjoins the same activities upon the king on behalf of outraged women (II. 10. 26, 22f).

Collateral with the working of the poor law were the provision for famine relief and subsidisation of agriculture. The Arthaśāstra wants the king to advance cash, corn and cattle to the cultivator (V. 2f). Usavadāta claims to have distributed stems of cocoanut trees in villages for cultivation, 1,000 in one and 32,000 in another.¹ During famine an enlightened government had an arduous time. Provision booths were thrown open, test works started under the direction of capable officers, loan and gratuitous relief were distributed in doles.² Similar relief measures were launched by benevolent governments against fire, serpents, tigers, epidemic diseases, etc.³

Another item of expenditure pressed home by the law-givers, would, if given effect to, prove a heavy drain on the treasury. From the king's duty of protection against theft restitution of stolen property follows as a matter of course. Compensation to the loser from royal treasury in the case of

¹ Ep. In., VIII. 8-10, iv-12. V.

² See *supra.*, pp. 109ff.

³ C. V. Vaidya : *Epic India*, p. 221.

non-recovery of stolen goods is accordingly inculcated by jurists (Gaut. X. 47 ; Vis. III. 66f ; Manu, VIII. 40 ; Yāj. II. 36. Sp. 75. 10 ; Arth. III. 16, IV. 12). Āpastamba wants to make officers pay for the loss (II. 10. 26. 8 ; Yāj. I. 272). Akbar followed the regulation when he made the *kotwāl* responsible for the loss and liable to compensation (Āini. II. p. 42). No concrete evidence of such practice during our period is however available. Generally speaking there was no constitutional obligation although deserving cases might receive the king's consideration and move his heart.¹

There were other and less pleasing features of revenue appropriation. ^{Sacrifices and bounties} Sacrifices often highly expensive are prescribed for the birth of an heir to the crown, for rainfall, for victory in war, and for all and sundry purposes going in the name of welfare of the state. Resources which might well be invested in nation-building activities were thrown into the Sacred Fire or devoted to the propitiation of a large class of professional priesthood who had little part in the productive forces of the land. The words of Buddha as preserved in the Pāli canon frequently castigate them as a class of parasites who encourage sacrificial rites and animal-killing only with a view to fill their stomach and their pocket. Land, cattle and coins flowed in uninterrupted stream to them on the plea of sacrificial fee. The figures of the Epics even on a modest estimate stagger modern conceptions of public finance. The king of Kampilla who in the Jātaka story is seen to drive his folk to the forest by oppressive taxation, propitiates a tree god by offering annually 1,000 pieces (*cf.* V. 217). Sacrifices and worships were not the only channels for throwing out public money on unproductive purposes. The

¹ A. S. Altekar is too bold to assert on the strength of a parallel injunction in the *Arthaśāstra* (IV. 13) that these were not mere pious wishes but "actual facts in real polity."—A History of Village Communities in Western India, p. 60

king often indulged in megalomaniac bounties not only upon monks and Brāhmaṇas but whosoever might take his fancy.

So it is time to revise the pet patriotic theory that the king was bound hand and foot by the Theory re. practice Sāstras within a narrow compass of financial rights and the people had their chests and barns amply safeguarded against royal robbery. Equally shifting are the grounds of the apologists for British administration who try to establish that the king,—‘devourer of the folk’ had,—besides the high normal rate of 16·6 p.c. of harvest,—unlimited powers of taxation over his ‘eminent domain.’ As far as theory goes the Indian revenue system stands unbeaten in the history of ancient races for its soundness, impartiality within a large sphere, elasticity of rates, safeguards against misuse of public money and elaborate techniques to meet complex needs and exigencies. But theories may be regarded more in breach than in observance, and the best theories are liable to the worst constructions. The king is the semblance of Indra who sucks water from the earth and returns it in beneficent rains which preserve life and growth. A king might well imitate the former characteristic and lose sight of the latter; and it makes a difference of heaven and hell if public good which is the *sine qua non* of taxation, is ignored. Hence in India, as in every country we have side by side Augustus and Nero, Hammurabi and Sardanapalus, Henry IV and Louis XV, only with this difference that the Satan quotes the gospel as vigorously as the saint and constructs out of it a plausible brief to put up his monstrous case. And a section of Brāhmaṇ-hood who struck the Mephistophelian bargain with the state which gave them exemption from revenue in exchange of paying a share of their piety, was always at hand to give their blessing to any measure that conciliates priestly pretensions with omnipotent sovereignty.

BOOK II
INDUSTRIAL ECONOMY

Ātthi Yonakāmāpi nānāpuṭabhedanam sāgalan nama
nagarāpi nadi-pabbata-sobhitam ramaṇīya-bhūmippadesa-
bhāgam ārām-uyyāno'pavana-talāka-pokkharaṇī-sampannam
nadi-pabbatta-vanā-rāma-neyyakam sutavantanimmitam
nihata-paccatthika-paccāmittam anupapīlitam vividha-
vicitra-daḷham-aṭṭāla-kotṭakam varapavara-gopuratoraṇam
gambhīraparikhā-paṇḍara-pākāra-parikkhittantepuram suvi-
bhatta-vīhi-caccara-catukka-singhāṭakam suppasaṇitāneka-
vidhavarabhaṇḍa paripūritanta-rāpanam vividha-dānaggasata-
samuppasobhitam Himagirisikhara-saṃkāsa varabhavana
satasaḥassa-patiṁḍitam gaja-haya-ratha-pattisamākulam
abbirūpa - naranāri - gaṇānucaritam ākiṇṇajanamanussam
puthu - khattiya - brāhmaṇa - vessa - suddamvividha - sahaṇa-
brāhmaṇa - sabhājana - sanghaṭitam bahuvividha - vijāvantā-
naravīra nisevitam Kāsika-koṭumbarakādi nānāvidha-
vatthāpaṇa sampannam suppasaṇita rucira-bahuvividha-
pupphagandhāpāpa - gandhagandhitam āsiṃsaniya - bahu-
ratana-paripūritam disāmukha-suppasāritāpāṇa singāra-
vāṇijagaṇānu - caritam kahāpaṇa-rajata - suvaṇṇa - kamsa-
patthara-paripūram pajjotamāna-nidhi-niketam pahūta-
dhanadhañña-vittūpakaraṇam paripuṇṇa-kosakoṭṭīhāgāram
bahv - annapānam bahuvividha-khajja - bhojja - leyya - peyya-
sāyaniyam Uttarakurusankāsam sampanna-sassam Ālaka-
mandā viya devapuram

Milindapañho, p. 1 f.

There is in the country of the Yonakas a great centre of trade, a city that is called Sāgala, situated in a delightful country well-watered and hilly, abounding in parks and gardens and groves and lakes and tanks, a paradise of rivers and mountains and woods. Wise architects have laid it out, and its people know of no oppression, since all their enemies and adversaries have been put down. Brave is its defence, with many and various strong towers and ramparts, with superb gates and entrance archways; and with the royal citadel in its midst, white-walled and deeply moated. Well led out are its streets, squares, cross-roads and market places. Well displayed are the innumerable sorts of costly merchandise with which its shops are filled. It is richly adorned with hundreds of almshalls of various kinds; and splendid with hundreds of thousands of magnificent mansions, which rise aloft like the mountain peaks of the Himalayas. Its streets are filled with elephants, horses, carriages and foot passengers, frequented by groups of handsome men and beautiful women, and crowded by men of all sorts and conditions, brāhmaṇas, nobles, artificers and servants. They resound with cries of welcome to the teachers of every creed, and the city is the resort of the leading men of each of the different sects. Shops are there for the sale of Benares muslin, of Koṭumbara stuffs, and of other cloths of various kinds, and sweet odours are exhaled from the bazars, where all sorts of flowers and perfumes are tastefully set out. Jewels are there in plenty, such as men's hearts desire, and guilds of traders in all sorts of finery display their goods in the bazars that face all quarters of the sky. So full is the city of money, and of gold and silver ware, of copper and stone ware, that it is a very mine of dazzling treasures. And there is laid up there much store of property and corn

and things of value in warehouses—foods and drinks of every sort, syrups and sweetmeats of every kind. In wealth it rivals Uttarakuru, and in glory it is as Alakamanda, the city of the gods.